



EXCLUSIVE: HALO'S HERE P.39

The top Xbox game is even better on the Mac—we show you why.



EXTREME SECURITY P.12

The U.S. Army's worst-case-scenario PowerBook tips.

87
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MacAddict

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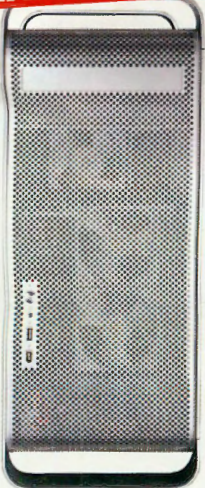
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FIRST REVIEW: POWER MAC G5

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Our experts test both and declare a winner.

HOW TO:

- ➔ Spy with a Webcam
- ➔ Compile Unix Applications
- ➔ Put AppleScript to Work
- ➔ Create a Custom Disk Image

REVIEWED

Acrobat Professional 6, Runtime Revolution 2.1, Canon Card Photo Printer, Macromedia Contribute 2, 80GB ABSplus backup drive, AmpliTube Live, WarCraft III, Anarchy Toolbox, and much more...



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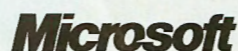
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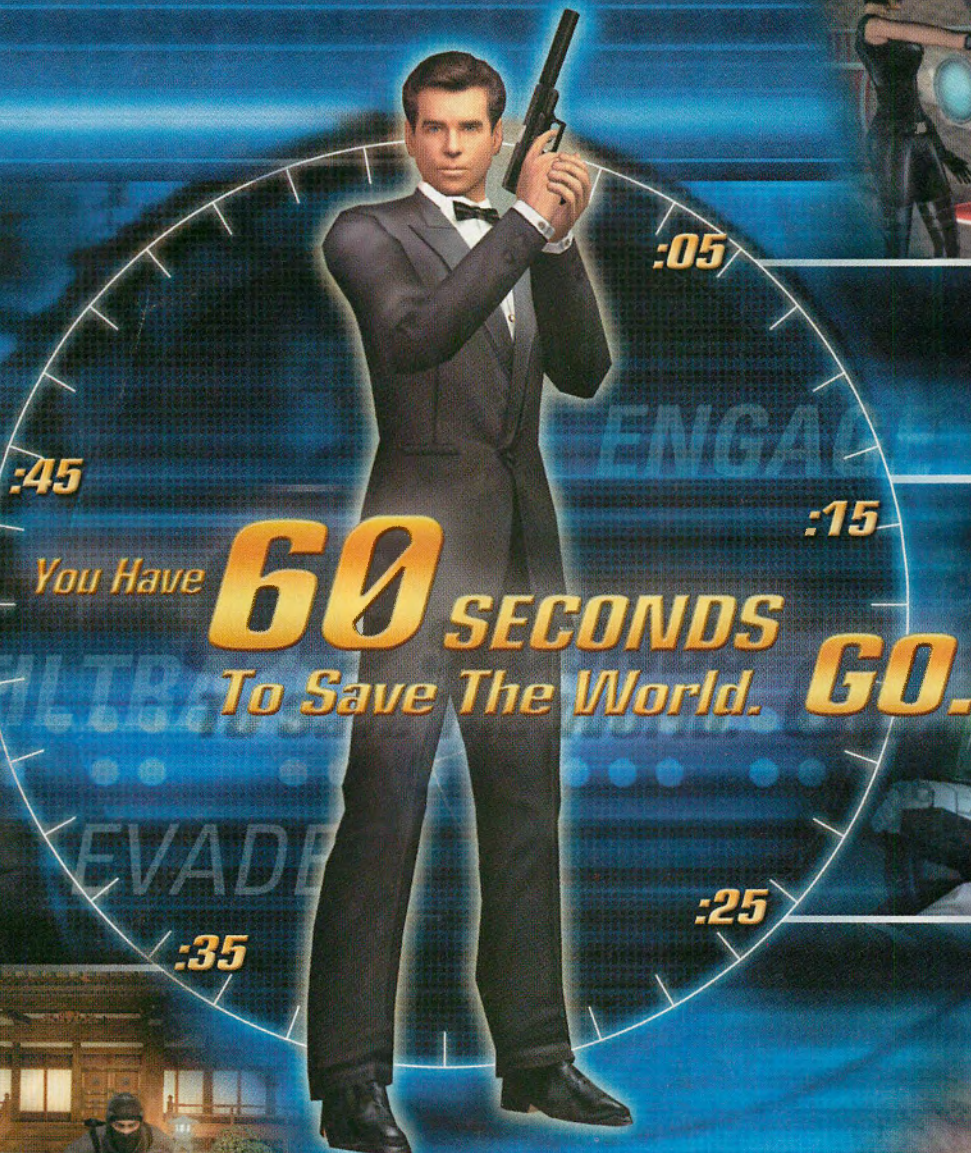
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MacAddict

features

18 Put Your Mac to Work

Feeling overworked? You can automate your Mac, your apps, and even your home so that you never have to lift a finger again. Well, you may have to lift one or two eventually. **by David Schloss**

30 MacAddict's Ultimate Home Office

If you're going to work at home (and who doesn't these days?), then you need the best equipment money can buy. We tell you what that is, whether you're a high-power consultant or a starving student. **by Robert Capps**

39 Halo's Here (at Last)

In 1999, Bungie announced Halo for the Mac. The next year Microsoft acquired Bungie and took our game with it. Well, Halo for Mac is here (almost) and it's amazing. **by Frank O'Connor**



how to

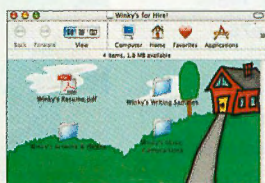
64 Ask Us

Add your own sound to iMovie, curb Entourage's annoying address auto-fill habit, back up Keychain, and update the currency converter in Mac OS X's Calculator.

66 Make AppleScript Do Your Dirty Work

Tired of doing the same boring tasks day in and day out? Some simple scripts can free you from monotony.

by Ed Haynes and Kris Fong



Every window should have a scenic view.

71 Create a Custom Disk Image

If you've got files or programs to deliver to the masses, you can contain content in a custom-designed disk image.

by Kris Fong

72 Compile Unix Apps for Mac OS X

Fink makes Mac-ported Unix apps a Mac OS X reality, but for apps whose codes have yet to be X-ified, here's how to make them yours with a simple compile.

by Mary E. Tyler

76 iChat or I-Spy with a Webcam

Whether you're a chatty Cathy or a peeping Peter, a webcam can provide personal face time with people and pets.

by Chris Baryllick



Suddenly, Wally had a brilliant idea.

every month

10 Editors' Page

Sometimes the most honest way to review a product is to not review it at all.

12 Get Info

The U.S. Army reveals its survival tips for your PowerBook. Developers talk updates for the G5 and Panther. New shareware helps you eliminate debt. And if you're so over iSync, check out rsync.

43 Reviews

- 44 **1.8GHz Power Mac G5** *G5 tower*
- 60 **80.0GB ABSPius Desktop-Mac** *backup drive and software*
- 50 **Acrobat Professional 6** *PDF-processing software*
- 58 **Air DWL-122 USB Adapter** *wireless network adapter*
- 46 **AmpliTube Live** *guitar amp emulator*
- 52 **Anarchy Toolbox** *After Effects plug-ins*
- 56 **Contribute 2** *Web-site updating software*
- 59 **Card Photo Printer CP-300** *mini dye-sublimation printer*
- 55 **Dfine 1.0** *Photoshop plug-in*
- 60 **JumpDrive Secure** *secure flash drive*
- 61 **MacSkate** *attachable Power Mac wheels*
- 51 **Mailsmith 2.0.1** *email client*
- 48 **Mystical Tint Tone and Color** *Photoshop plug-ins*
- 61 **NaviPod 3G** *wireless iPod remote*
- 56 **Photo-Objects** *stock photography*
- 59 **Podzilla** *gear bag*
- 47 **PowerLite S1** *multimedia projector*
- 53 **Runtime Revolution 2.1** *application-development environment*
- 49 **Spy Hunter** *action racing game*
- 54 **WarCraft III: The Frozen Throne** *real-time war strategy/role-playing game*
- 58 **WiFi Finder** *wireless-network detector*
- 60 **Zip-Linq** *retractable cables*



44



60



61



59



49

62 The Hot List

The best of the best from recent reviews. If the editors of MacAddict went shopping, this is what we'd buy.

Projector lens or power bidet?



47

QUICK TIPS FROM THIS MONTH'S ISSUE

➔ KEEP YOUR GUN LOADED

In the game Halo, your machine gun tells you how many bullets you have left so you can prepare for when you have to reload. **From**

"Halo's Here (at Last)," p39

➔ DELETE MENUBAR ITEMS

Remove Menubar items by holding down Command while clicking and dragging the item. **From Ask Us,** p64

➔ BE LAZY

If you launch the same AppleScripts daily, combine them to create one superscript, and set it as a Login Item. **From "Make AppleScript Do Your Dirty Work,"** p66

```
#!/usr/bin/perl
# Make AppleScript Do Your Dirty Work
# This script combines several AppleScripts into one
# and sets it as a Login Item.

# AppleScript 1: Finder
tell application "Finder"
  -- ... (code omitted) ...
end tell

# AppleScript 2: Safari
tell application "Safari"
  -- ... (code omitted) ...
end tell

# AppleScript 3: Mail
tell application "Mail"
  -- ... (code omitted) ...
end tell

# AppleScript 4: iChat
tell application "iChat"
  -- ... (code omitted) ...
end tell

# AppleScript 5: iSync
tell application "iSync"
  -- ... (code omitted) ...
end tell
```

➔ SAVE YOUR PENNIES

The Power Mac G5 is here, and getting one will make everything better—so get one. Now *that's* a tip! **From Reviews,** p44

➔ GET STREAMING (SOMEWHAT)

Unless you pay extra for Web-site streaming, you won't be able to upload full-motion video to your site. Instead, upload an image every 10 seconds or so to avoid bottlenecks. **From "iChat or I-Spy with a Webcam,"** p76



➔ TWEAK CALCULATOR

To update the currency converter in the Mac OS X Calculator, launch Calculator and select Update Currency Exchange Rates from the Convert menu. **From Ask Us,** p64

94 Log Out

94 Letters

A '70s shag-a-delic PowerBook, Apple neck tattoo, and praise for the Mac addict of tech support.

95 Contest

Win a 250GB Maxtor OneTouch drive.

96 Shut Down

Go get your arc welder, belt sander, and woolliest socks—it's time to upgrade your Mac like a manly man. No brain required.



In a bind? Zap your PRAM!

Don't Get Burned Buying Memory Upgrades!

Three Questions Other Memory Providers Hope You'll Never Ask...

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— Computer Shopper magazine

Do you actually make the memory you sell?

WARNING! Listen carefully to the answer when you ask this question. Other memory companies claim to manufacture memory, too. What they actually do is assemble the memory chips made by someone else into memory modules. Ask them this: Do you make the chips that go on your memory modules? The chips are the important part, after all.

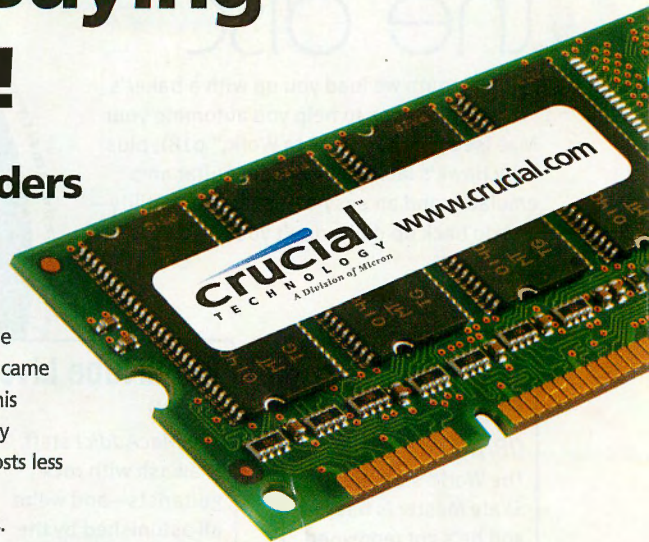
Crucial is the only memory upgrade supplier that's part of a major DRAM manufacturer, Micron. We actually make the chips that go on the modules. In fact, because the world's leading

computer manufacturers use our memory, chances are good that the memory in your system right now came from Micron. Crucial brings this same high-quality memory directly to you. It only costs less because you don't pay middleman mark-up fees.

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Prices may vary according to specific system requirements. The price listed was valid on 8/28/03 when we sent this ad to the publisher; however, prices may have dramatically increased or decreased since then. Visit the FAQ section of Crucial.com to learn more about why memory prices go up and down.

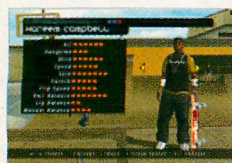
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the disc

This month we load you up with a baker's dozen of apps to help you automate your Mac (see "Put Your Mac to Work," p18), plus Tony Hawk's latest, a way-cool guitar amp emulator, and an easy-to-use backup utility—you do back up daily, don't you?

Tony Hawk's Pro Skater 4 demo

The World's Greatest Skate Master is back—and he's got renowned street skater Kareem Campbell with him.



AmpliTube Live demo

The MacAddict staff is awash with rock guitarists—and we're all astonished by the quality of this guitar amp emulator.



Déjà Vu

No more excuses. With a backup utility as intuitive and simple as this one, there's no reason to avoid your daily backup routine.



AUDIO & MUSIC

AmpliTube Live demo
Ask the DJ 1.3
Canz3D 2.1

DEVELOPMENT

Contribute 2 demo
REALbasic 5.2.1 demo
Revolution 2.1 demo

FUN & GAMES

Indiana Jones game trailer
Tony Hawk's Pro Skater 4 demo
WarCraft III demo

GRAPHICS & MULTIMEDIA

Anarchy Toolbox 1.01 demo
Dfine 1.0 demo
Mystical Tint Tone and Color demo
WuffCam 1.2

INTERFACE

iKey 1.0.3
Keyboard Maestro 1.2.3
Labels X 1.5
LaunchBar 3.2.12
QuickKeys X2 2.0.1 demo
Viu 2.3

INTERNET & COMMUNICATION

KidzMail 1.1.2
Mailsmith 2.0.1 demo
NetZero OS 9
NetZero OS X
Transmit (OS X) 2.5.1

PRODUCTIVITY

BBEdit 7.0.4 demo
Debt Minder 1.8.8
FirstEdge 1.0r5.7.2 trial
Office v. X Test Drive
ThinkFree Office 2.2 trial

UTILITIES

CarbonCopyCloner 2.2
Déjà Vu 2.4.1
DiskTracker 2.3
DiskTracker (OS X) 2.3

Indigo 1.2 trial

MacJanitor 1.2.1
PodQuest 1.0.1
Retrospect Desktop 5.1 trial
Salling Clicker 2.0
SilverKeeper 1.1

SPONSORS

DriveSavers: Lost Data video promo
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Staff Video: The Ultimate Home Office

Take a tour of our droolworthy Ultimate Home Office, equipped with an array of goodies chosen by the experts at MacAddict. From a Power Mac G5 to caffeinated mints, this setup will make you want to move right in.



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Disk Dilemma

Even the best disk-repair utility can let you down.



Niko, our reviews editor, and I debated this for one a long time. After all, one of our prime directives here at *MacAddict* is to help you get the most out of your already-stretched product-buying bucks. We test. We analyze. We review. We argue. We recommend. And so the decision not to review an entire product category was a tough one.

We're not going to review the latest Mac OS X-compatible disk-repair utilities: Symantec's Norton Utilities and Alsoft's DiskWarrior. We also aren't going to review Micromat's TechTool Pro when it's finally released.

No, it's not that we're lily-livered layabouts. We decided not to bestow our sacred blue widgets on the current round of disk utilities because we storage wonks here at *MacAddict* have learned an important lesson during our years of trimming B-trees and pruning leaf nodes: There are so many different species of disk-destruction demons that it's impossible to recommend one pro-level disk utility over another. Even a top-flight disk-repair utility can find itself flummoxed by a problem that its competitor handles with ease—and vice versa.

And anybody who tells you differently is wrong.

If you don't believe us, ask someone whose daily routine includes disk-repair duty. Sure, they all have stories about how Product X saved a drive that Product Y couldn't—but press them on it, and they'll admit that the reverse has been true as well. I, for one, have seen Norton's Disk Doctor wreak havoc on a seemingly healthy drive, and the next day save another from an early grave. Alsoft's DiskWarrior has been both my savior and a many-hour, disk-thrashing disappointment. Micromat's TechTool Pro has ferreted out problems alternative utilities didn't see, but has been blind to other problems.

Data loss can make people emotional. So can data reclamation. Some people swear by the same utility that others swear at. If a particular utility has saved your data, by all means call it "friend"—but don't curse it when it fails you one dark day. And fail it will, eventually.

Our advice is simple: Have a couple of disk utilities on hand for that inevitable day when your hard drive gets cranky. One may help, the other may not—and when tomorrow's drive emergency arises, the reverse might be true.

And, of course, back up.

Enjoy, *Rik*

coming soon: december 2003

Our editors fill you in on what they're preparing for the next issue of *MacAddict*.

FEATURES: Buyers' Guides

We're checking out all the coolest stuff for Christmas, Hanukkah, Kwanzaa, or whatever holiday you might deem giftable. We're up to our eyeballs in digital cameras; and we're testing the latest swarm of DVD authoring solutions, looking at the most droolworthy gadgets, and digging up el-cheapo stocking stuffers.—Cathy

HOW TO: Rip and Blog

Thanks to Geoff Coffey, who's going to explain how to rip DVD soundtracks into MP3s, I can't get *School House Rock* out of my head. We'll also show you how to blog on .Mac. I'm also fearing electrical fires—and my electrical bill—with the horde of battery chargers in my home thanks to Cathy's upcoming digital camera round-up.—Kris

REVIEWS: Creative Tools

We're driving each other loopy with Apple's Soundtrack app, and we finally received an OS X-able version of Pro Tools, giving us the perfect excuse to try out some big-time audio controllers. We also have multimedia tools like DVD Studio Pro 2 and After Effects 6, plus a surprise guest: Tony Hawk's Pro Skater 4.—Niko

NEWS: Music, Media, and Money

World-famous DJ Paul Van Dyk shares his secrets on spinning high-quality, high-impact sets right from his PowerBook. We give you the low-down on the differences between all those media cards for digital cameras. Plus, the Apple Retail Stores versus <http://store.apple.com> debate: Who should shop where?—Narasu

STAFF RANTS

Q: Has a disk utility ever saved your bacon and/or your hard drive?



Jenifer Morgan LITTLE PIGGY WITHOUT ROAST BEEF
Has a disk utility ever saved your bacon and/or your hard drive? No disk utility could save even a byte of my most recent hard-drive patty meltdown—or my bacon (on the side). However, I soon got a completely new and completely blank hard drive!



Chris Imlay SLIPPERY FELLA
Has a disk utility ever saved your bacon and/or your hard drive? I slipped on a disc, which resulted in a slipped disk...and whatever bacon there might have been lying around at the time was most certainly consumed by my own hungry maw. Mmm...bacon. D'oh!

Peter Marshutz TRADITIONALIST



Has a disk utility ever saved your bacon and/or your hard drive? Both my hard drive and backup Jaz drive crashed—at the same time, of course. I tried Disk Doctor and TechTool Pro. Nothing. As a last resort, I tried an old version of Apple's Disk Tools—and that out-of-date free tool saved the day. Lesson learned: Save your old system disks.



Cathy Lu TURKEY-BACON ADVOCATE
Has a disk utility ever saved your bacon and/or your hard drive? Ugh. Buying a disk utility is like ordering the baked fish with lima beans—you know it's good for you, but you'd rather have the bacon burger and chili-cheese fries. And speaking of bacon, yeah, Norton Disk Doctor has saved mine on more than one occasion.



Niko Coucouvanis HARD-BITTEN REALIST
Has a disk utility ever saved your bacon and/or your hard drive? Yes, disk utilities have served me well on occasion—but not nearly as often as they've let me down. I lump disk utilities in the same category as insurance and bicycle helmets: Pseudo-necessary evils that are worthless 99 percent of the time but might work when you really need them.



Narasu Rebbapragada B-TREE HUGGER
Has a disk utility ever saved your bacon and/or your hard drive? Not really. The most exciting problem a disk utility has fixed for me is that pesky catalog B-tree error. Everything else has been beyond repair.



Kris Fong DISKLEXIC
Has a disk utility ever saved your bacon and/or your hard drive? DiskWarrior rescued my home hard drive, but Norton fried my bacon into a blackened, carcinogenic crumb.



Max UTOPIATILITARIAN
Has a disk utility ever saved your bacon and/or your hard drive? Living in a parallel dimension has its advantages—when one of my drives dies, I simply will back to health. Don't you wish you could?

The most evolved computers now have multi-functions and printers to match...



COLOR LASER
From \$1499



LASER
PRINTING
From \$199



WORKGROUP
LASER PRINTING
From \$449



When it comes to imaging solutions that are every bit as innovative as your Mac, we're the only name you need to know.

That's because our award-winning line of Mac-compatible printers and Multi-Function Center® models are designed to deliver both maximum performance and value.

From our full line of high-quality printers (including the HL-5070N, the first printer to support Rendezvous™), to versatile all-in-one multi-function units which print, copy, scan, and more, you'll find our products are every bit as evolved as our customers.

COLOR
FLATBED MFC
From \$179



LASER FLATBED MFC
From \$349



LASER MFC
From \$249



COLOR MFC
From \$129



A VARIETY OF MODELS AVAILABLE AT: MacWarehouse, MacMall, MacConnection, MacZone, Microcenter, CDW, Office Depot, Staples, OfficeMax, Fry's, J&R Computer World, and Apple Stores (or www.store.apple.com).



At your side.™

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For more information please visit our Web site at www.brother.com • All trademarks and registered trademarks are the property of their respective owners.

POWERBOOK DESERT SURVIVAL

1 CANS OF COMPRESSED AIR

"The sand in Iraq is not like the sand at [a] beach, it's more like talcum powder," says Rosales. "It's so fine that you can't see it build up right away. [We] make it a habit to lift the keyboard piece out and spray out the internal components of our laptops every morning if possible."



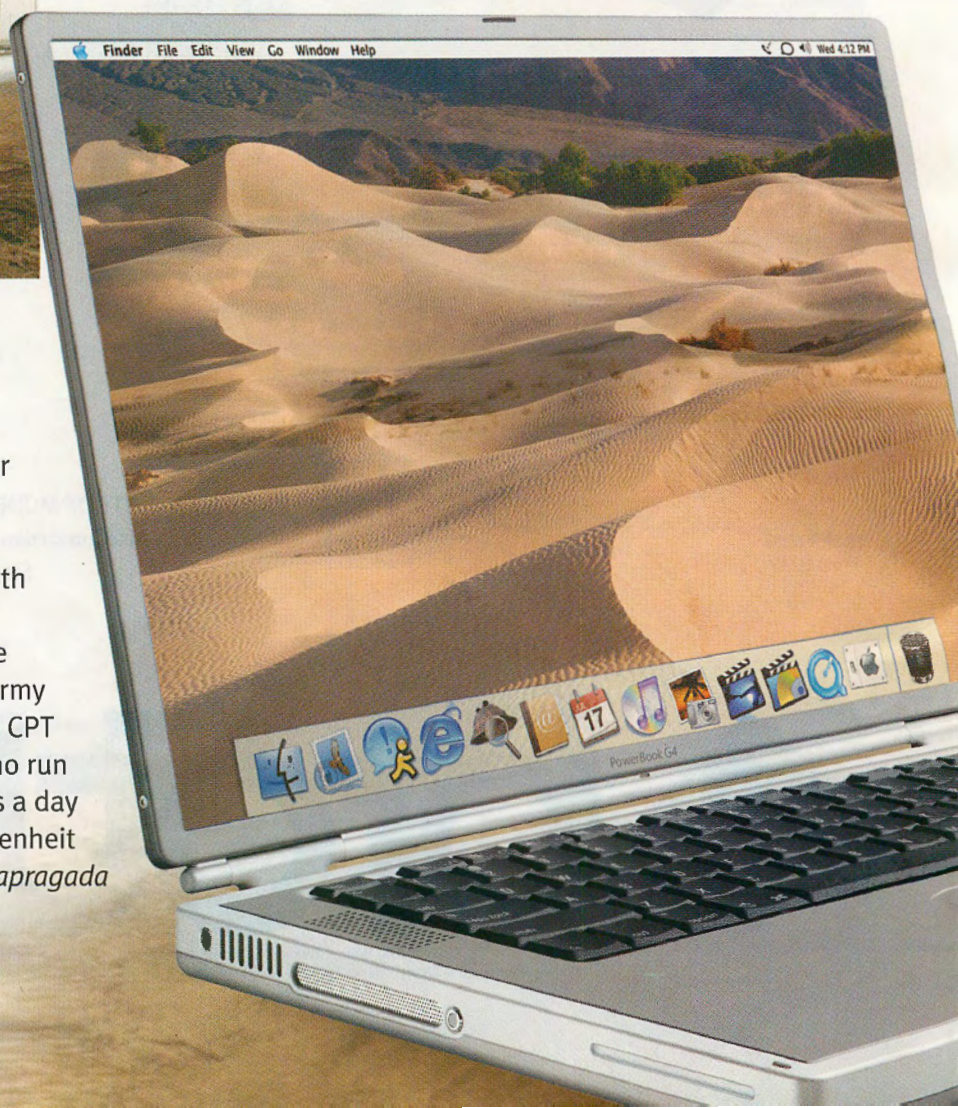
2 HEAVY-DUTY PLASTIC BAGS

To protect against dust and sand, Hayes says he puts his PowerBook into a waterproof, heavy-duty plastic bag designed to protect a gas mask.



Tips from a Source
That Knows:
The U.S. Army

Vipers and scorpions thrive in desert sandstorms and blistering sun. PowerBooks don't. Whether you plan to take your PowerBook to next year's Burning Man festival, backpacking around Death Valley, or trekking across North Africa, here are some products and tips to help you protect it in extreme desert conditions—all courtesy of Army SGT Carlos Rosales (above left) and CPT Christopher Hayes (above right), who run their PowerBook G4s 12 to 14 hours a day in heat upward of 100 degrees Fahrenheit while on duty in Iraq.—Narasu Rebbapragada





3 ISKIN KEYBOARD PROTECTOR

(\$24.99, www.iskinprotect.com) This translucent silicone sheet also helps prevent sand and dirt from getting into the keyboard.

4 PADDED VELCRO LAPTOP SLEEVE

A padded Velcro laptop sleeve protects your 'Book against sand and jostling when it's inside a shoulder bag.

5 IKLEAR APPLE POLISH KIT

(\$24.95, www.iklear.com) This five-ounce nonaerosol spray with lint-free wipes comes in handy for cleaning the screen and outer casing.



6 ROAD TOOLS PODIUMPAD

(\$29.95, www.roadtools.com) This laptop stand elevates the PowerBook to cool it slightly. "One-hundred-plus-degree weather will make your laptop hot enough to fry an egg, and no, I haven't tried your egg challenge," says

Rosales, referring to the May 2003 MacAddict Staff Video.

7 TWO STRIPS OF WOOD

(an alternative to the Podium Pad) This less-elegant cooling solution also allows air to flow underneath your 'Book.



8 USB MEMORY DEVICE

"Right before I left the United States, I bought a USB memory device," says Hayes. "Back then, everyone thought it was a novelty. Now we have a bunch of them because they work despite the heat and dust."

9 CDs

Warning: Extreme heat can warp CDs. "The heat lifted the top on one of my discs even though it was never in the sun," says Hayes.



10 FLOPPY DISKS

"Floppy disks are useless here. Sometimes they are unreadable after one use. One time I put a disk in my pocket and walked five minutes to another building. When I got there, the disk was shot," says Hayes.

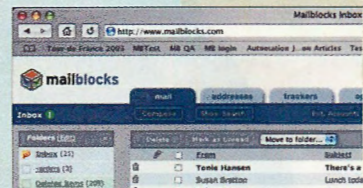


NEW STUFF

SPAM-FREE EMAIL

What it is: Phil Goldman, cofounder of WebTV, has joined the antispam crusade by launching a Web-based email service that promises to manage and purge spam from all of your email accounts. Sure, you've heard that before, but Goldman says his service's *challenge-response system*, which asks email senders to click a URL to verify that they're not spammers, is different. Instead of sending challenge responses to all of your email senders (a surefire way to lose friends), Mailblocks uses an algorithm to suss out and challenge only suspicious characters.

Why it's cool: Mailblocks is fast because it requires less server-client conversation than other Web-based services. Plus, it's designed to challenge only suspect email, not your friends.



Mailblocks

\$9.59 to \$24.95 per year
Available: Now
Mailblocks
www.mailblocks.com

Mailblocks
promises fast,
spam-free Web
email.

DVD-R BY PORSCHE

What it is: Designed by F.A. Porsche, LaCie's externally beautiful, FireWire-connected DVD±RW Slim offers 2X write, 2X rewrite, and 8X read speeds for DVD, and 16X write, 10X rewrite, and 24X read speeds for CD.

Why it's cool: Now you can tell your friends with internal SuperDrives that being beautiful on the inside really means you're ugly.



DVD±RW Slim

\$369
Available: Sept. 2003
LaCie
www.lacie.com

LaCie unveils an
ultrathin DVD-R
drive, designed
by Porsche.

QUICKEN'S YEARLY REV

What it is: In this year's rev of its Quicken personal-finance software, Intuit has added new financial performance indicators, links to daily news about stocks, new asset-class categorization, a password-protected emergency records organizer, and iCal support.

Why it's cool: This year your stock portfolio really will make money, and you really will pay your bills on time. Really.

Quicken 2004

\$69.95
Available: Now
Intuit
www.intuit.com

WIRELESS HEADSET

What it is: Plug the Blue2 USB adapter into your Mac, and enjoy up to 30 feet of wireless connectivity with the rechargeable Lithium-Ion JABRA FreeSpeak headset. Orange Micro says the headset also works with Bluetooth-enabled cell phones.

Why it's cool: Anyone who uses a headset knows how irritating the cord is.

Blue2 Wireless Headset

\$129
Available: Now
Orange Micro
www.orangemicro.com



Untether yourself
with this cordless
headset.

DROOLWORTHY

Sexy Stuff We Can't Wait to Get Our Mitts On



← Cooler than the iPod?

OK, maybe it's cooler, maybe it's not—but **Rio's 1.5GB Rio Nitrus** (\$299.99, www.rioaudio.com) is übercompact and goes better with black leather than the iPod does. This USB 2.0 player with five-band EQ, 16 hours of rechargeable battery life, cross-fading, and full playlist support launched in August for the PC, Mac OS X and iTunes compatibility is scheduled to follow two months later.—NR

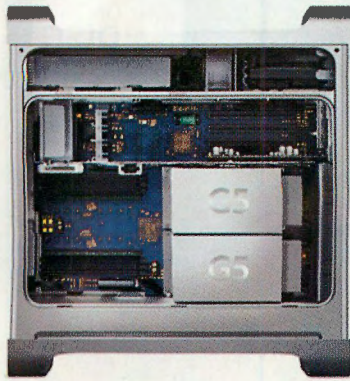
PHOTOGRAPH COURTESY OF RIO

See-through Scanner →

Coca Cola's clear Coke was a bust. HP's clear scanner, the **Scanjet 4670** (\$199 street, www.hp.com), looks a lot more promising. This 48-bit, 2,400-dpi USB device scans materials up to 8.5 by 11 inches, and includes an adapter for scanning slides and transparencies.—NR



PHOTOGRAPH COURTESY OF HP



WILL YOUR SOFTWARE SURVIVE THE G5 AND PANTHER?

What Developers Are Doing

This summer, Apple hit developers with a double whammy: the new 64-bit Power Mac G5 and Panther (aka Mac OS X 10.3), due out by the end of the year. Here's what some developers are doing to optimize their software for the G5 and Panther.—NR



GRAPHICS

Adobe Photoshop (\$699, www.adobe.com)

For the G5: Adobe released the G5 Processor Plug-in Update for Mac OS X. When we ran Photoshop 7.0.1 updated with this patch on

a 1.8GHz Power Mac G5 and compared our test results to Photoshop 7.0.1 running on the Dual 1.42MHz Power Mac G4, the single-processor G5 was between 20 and 35 percent faster, depending on the test. We look forward to running the same tests on the more-potent Dual 2GHz Power Mac G5.

For Panther: Sources have expressed some concern. Apple has changed the layout for dialogs in a way that requires some code tinkering. Don't expect a patch for Photoshop 7.

DISK UTILITIES

Symantec Norton SystemWorks (\$129.95, www.symantec.com)

For the G5: Say good-bye to bootability, at least for the time being. Until Symantec releases a patch, SystemWorks won't launch on the new G5—existing SystemWorks discs aren't programmed to recognize the new hardware so they won't boot.

For Panther: Symantec will need to release a patch for Panther, but you won't have to wait as long as you did with Jaguar.

HOME OFFICE

Smith Micro FaxSTF X Pro (\$89.95, www.smithmicro.com)

For the G5: FaxSTF X Pro should work fine on the G5.

For Panther: We were sure that Panther's new Fax button would kill off FaxSTF, but Smith Micro says that while Panther's Fax button serves the user who sends one to two faxes a month, FaxSTF is better option for small businesses that do bulk faxing or that fax over a network. Expect a patch to update drivers.

GAMES

MacSoft's Unreal Tournament 2003 (\$49.99, www.macsoftgames.com)

For the G5: MacSoft is working on a G5 patch for UT3. Just how much it will boost performance hasn't yet been determined.

For Panther: MacSoft says the switch from Mac OS 10.1 to Jaguar boosted the performance of all of its OpenGL-based games. Since MacSoft hasn't identified any major problems with Panther (yet), it's anticipating a smooth transition.

SHAREWARE PICK OF THE MONTH

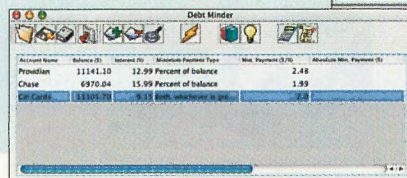
KILL OFF CREDIT-CARD DEBT

Debt Minder www.ithinksolutions.com \$24.95

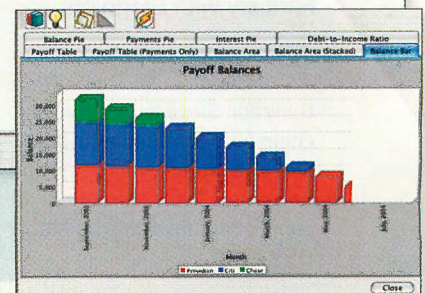
Credit card addicts, it's time to fix your finances. iThink Solutions Software's Debt Minder (\$24.95, [ithinksolutions.com](http://www.ithinksolutions.com)) takes your credit-card balances, finance charges, and minimum payment information, and generates smart payment schedules to help you whittle down your debt. It takes into account credit card perks such as introductory APRs, and gives you snapshots of your portfolio with built-in charts and graphs. Just remember to pay the shareware fee before cutting up your credit cards.—Andrew Tokuda



Clockwise from left: Debt Minder summarizes you debt, helps create a payment plan, and charts your progress.



Payoff Schedule: Power Pay Highest Interest Account							
Balance Pie		Payments Pie		Interest Pie		Debt-to-Income Ratio	
Payoff Table	Payoff Table (Payments Only)		Balance Area		Balance Area (Stacked)		Balance Bar
Month, Year	Chase	Citi	Provision	Grand Total			
September 2003	\$2402.00	\$299.00	\$299.00	\$3000.00			
October 2003	\$2416.00	\$293.00	\$291.00	\$3000.00			
November 2003	\$2242.35	\$474.65	\$285.00	\$3000.00			
December 2003	\$2721.00	\$279.00	\$279.00	\$3000.00			
January 2004	\$2721.00	\$279.00	\$279.00	\$3000.00			
February 2004	\$2721.00	\$279.00	\$279.00	\$3000.00			
March 2004	\$2721.00	\$279.00	\$279.00	\$3000.00			
April 2004	\$1602.58	\$1397.42	\$1397.42	\$3000.00			
May 2004	\$3000.00	\$3000.00	\$3000.00	\$3000.00			
June 2004	\$3000.00	\$3000.00	\$3000.00	\$3000.00			
July 2004	\$2027.68	\$2027.68	\$2027.68	\$2027.68			



INDIANA JONES AND HIS NEW CRUSADE

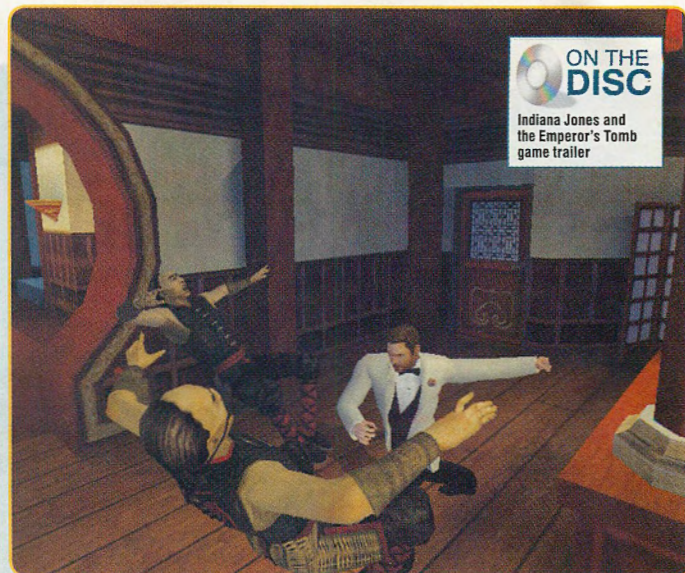
New Game Packs Whips, Guns, and Punches

Archaeologist Indiana Jones returns to the Mac in glorious third-person adventuring style. The year is 1935, America is in the depths of the Great

Depression and China needs a daring rogue to explore the tomb of its first emperor. Run, jump, punch, and solve puzzles while following Indy through the jungles of Ceylon and underwater palaces of Istanbul. Will your handy whip and revolver be enough to find the Heart of the Dragon? What does your new mysterious partner, Mei Ying, have up her sleeve? Hey, no time for love, Dr. Jones! —Matt Osborn



What's an Indy Jones flick without a secret tomb and a pillar-wrapping python?



ON THE DISC
Indiana Jones and the Emperor's Tomb game trailer

Booty hunter Indiana Jones has been working out since *The Last Crusade*.

Indiana Jones and the Emperor's Tomb

Price \$39.99

Available September 2003

Aspyr
www.aspyr.com

MAXX PAYNE VERSUS MAX PAYNE

Fighting Crime and Lawyers

Retired WCW pro wrestler Maxx Payne (aka Darryl Peterson) filed a \$10 million lawsuit against Rockstar Games, 3D Realms Entertainment, Gathering of Developers, and Remedy Entertainment over identity theft of his stage name and persona. The game's developers have no comment.—MO

CELEBRITY GOD MATCH

Mythical Gods vs. Gods in Age of Mythology

Experience the wrath of the gods in MacSoft's newest real-time strategy game, *Age of Mythology*. The Greeks, Egyptians, and Norse are yours to command—and so are their mythical gods and creatures. Cultivate resources, technology, and religious conviction to smite your enemies. Gameplay is like the game's predecessor, *Age of Empires*, but in 3D.—MO



Invoke the gods in this 3D RPG.

Age of Mythology

Price \$50

Available October 2003

MacSoft
www.macsoftgames.com

DUNGEON SIEGE MODS

Expand the Role-Playing Fantasy with Siegelets

Extend your gaming excitement on MacSoft's *Dungeon Siege* with *siegelets*—community-created add-ons that add stories, weapons, and new worlds to explore. Here are some of our favorites for Mac OS X.—MO



The Circle of Lorent
(www.radeem.com/lorent)

Complete three interrelated quests, conquer an evil invasion, and defeat a mad wizard.



Copperhead: Retaliation
(www.planetcopperhead.com)

Travel into the future in this sci-fi total conversion—complete with new weapons, characters, and levels.



Chicken World (www.siegenetwork.com)

All those chickens you hacked up are back, and they've got a honey-dipped taste for revenge.

How to Install

- Download the siegelet.
- Decompress the Stuffit or RAR file.
- Place the unstuffed .DSRES file in *Dungeon Siege's* Resources folder (Applications > *Dungeon Siege* > Resources).
- For optimal performance, deactivate all other game modifications.

IN SYNC WITH RSYNC

Syncing Files Using the Terminal

For synchronizing contacts, calendars, and bookmarks between your Mac and mobile devices, iSync is your best bet. Unfortunately, iSync doesn't synchronize files—such as that novel you're writing or the spreadsheet you're building. To sync those items, you need the Unix utility `rsync`.

What's `rsync`?

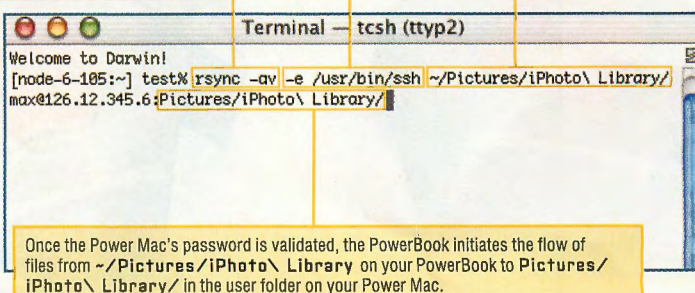
The command `rsync`, which stands for remote synchronization, comes with Mac OS X, and lets you synchronize individual files or entire directories between Macs. Since `rsync` updates only files that have changed and, more specifically, only the data within those files that has changed, it syncs extremely quickly.

To sync files, launch the Terminal (Applications > Utilities) and type the following command (note that you need two Macs running the same version of `rsync`):

`rsync -av` is an option on the `rsync` command. The `-a` option puts `rsync` into archive mode, which retains all of the permissions and resources for the files in the directory you want to sync. For example, if you have a folder with read-only access (such as your Drop Box), when you sync that folder with `rsync`, its permissions will go along with it. The `-v` option puts `rsync` into verbose mode, which means that when `rsync` runs, it displays a list of the synchronized files in the Terminal window.

This portion of the command initiates an SSH (secure shell) connection to your Power Mac (located via its IP address). SSH prompts you for the password on the Power Mac.

This is where the files you want to sync are located on your PowerBook.



`rsync -av -e /usr/bin/ssh source user name@IP address:destination`

An Example

You're on the road, taking loads of pictures that you want to sync between your PowerBook and your Power Mac

back at the office. The command shown in the screenshot above works like a charm.

To learn more about `rsync`, type `man rsync` in the Terminal to look up its manual page.—Chuck Toporek



Chuck Toporek is the Macintosh editor with O'Reilly & Associates; author of the *Mac OS X Pocket Guide, 2nd Edition*; and coauthor of *Mac OS X in a Nutshell*.

FLASH, FIREWORKS, AND DREAMWEAVER REVAMPED

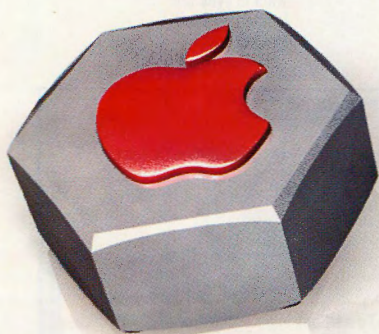
What's New and Why It's Cool

Macromedia (www.macromedia.com) has announced new versions of its Flash, Fireworks, and Dreamweaver

Web graphics and authoring apps. All products should be available by the time you read this, either alone or bundled

with FreeHand (not upgraded yet) as Macromedia's Studio MX 2004 (\$899 or \$999 with Flash Pro).—NR

	What's New	Why It's Cool
Flash MX 2004 \$499 or \$199 (upgrade)	Illustrator 10 and PDF support Timeline Effects (aka plug-ins)... Behaviors..... Spell-Checker..... Flash MX Professional.....	<ul style="list-style-type: none"> Designers can now import Illustrator, PostScript, and PDF files directly into Flash. Similar to Photoshop plug-ins, you can use Timeline Effects to quickly execute transformations that are laborious to craft by hand. With Behaviors, you can create new automated tools, such as chart makers. Who doesn't ene da spelling cheker these days? Macromedia is launching a pro version of Flash (\$699) with a better video codec and more application-development tools.
Fireworks MX 2004 \$299 or \$149 (upgrade)	Up to 85 percent faster..... Nondestructive Motion Blur Live Effects.....	<ul style="list-style-type: none"> Faster is always better. Create editable motion-blur effects.
Dreamweaver MX 2004 \$399 or \$199 (upgrade)	Major support for Cascading Style Sheets (CSS)..... Supports Secure FTP..... Cross-Browser Validation..... Supports cutting and pasting from Word and Excel..... Supports Flash elements	<ul style="list-style-type: none"> This is huge. Dreamweaver MX 2004 is designed around Cascading Style Sheets for better management of everything from text styles to layouts. Secure encryption for transmitting data, user names, and passwords. Checks whether tags and CSS rules are supported in major browsers like Mozilla, Safari, Opera, Netscape, and Internet Explorer. If you chart a lot, you'll be psyched. Adds Flash widgets—think scrollbars and buttons—to your Dreamweaver pages.



Put Your Mac To Work

You work too hard—and your Mac wants to help. Here's how to bring the power of automation to your Mac, your applications, and even your home.

Your Mac exists to make your life easier. It's intended to relieve you of repetitive chores—but all too often you find yourself repeating the same tedious tasks, over and over. And over.

Life doesn't have to be that boring.

Your Mac is ready, willing, and able to serve you better—you just need to tell it what to do. Many of the most common applications have automation tools built in, but those tools are just hanging around, unemployed. Not only are apps waiting for you to automate them—so is Mac OS X. In fact, your Mac can even help you automate your own home by controlling your lights, heating, air conditioning, home entertainment center, the works—it can even water your garden.

We show you how to use your Mac to automate your life and save time. All it takes is a little poking around and the desire to make the most of your day. Unless, that is, you *enjoy* wasting time.

by David Schloss

illustrations by Oliver Wolfson



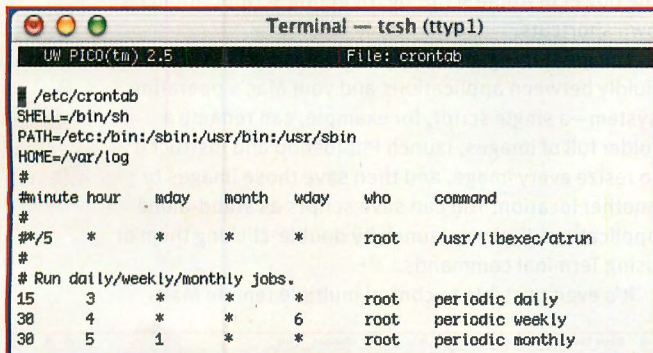
Many of the applications mentioned in this article can be found on this month's Disc.

Automate Your Mac

Before you get started on all the fun stuff—such as automating Photoshop and spritzing your ferns—start by automating your Mac itself. If your Mac can handle routine chores on its own, you'll be free to focus your energy on more-creative pursuits.

► Schedule Your Maintenance

Mac OS X includes a great Unix tool called *cron*—short for *chronograph*—that can schedule and perform routine tasks. Cron jobs, as they're called, occur at regularly scheduled times and perform predefined actions. Terminal jockeys use cron jobs to launch scripts written in the Perl programming language, run AppleScripts, trigger PHP actions (PHP is a scripting language often used in Web-site development), and more.



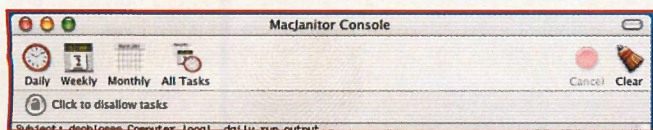
```
Terminal — tcsh (tty1)
UW PICO(tm) 2.5      File: crontab

/etc/crontab
SHELL=/bin/sh
PATH=/etc:/bin:/sbin:/usr/bin:/usr/sbin
HOME=/var/log
#
#minute hour   mday   month   wday   who   command
#
#*/5 * * * * root /usr/libexec/atrun
#
# Run daily/weekly/monthly jobs.
15 3 * * * root periodic daily
30 4 * * * 6 root periodic weekly
30 5 1 * * root periodic monthly
```

Use the Terminal to edit the crontab file and change when and how often your Mac runs its built-in system-diagnostic tools.

The most important aspect of cron is that it's preconfigured to run daily, weekly, and monthly drive- and system-maintenance tasks, such as deleting space-hogging log files, updating system databases, and more. The only problem is that those tasks are set to start in the wee hours of the morning. If your Mac is shut down or even sleeping...sorry, Charlie—no optimization for you.

There are a few ways to change when cron-based diagnostics run. Some involve the Terminal (find a comprehensive introduction at www.macdevcenter.com/pub/ct/51—click “Learning the Terminal in Jaguar, Part 1,” for a great, if somewhat lengthy, tutorial). If you'd rather deal with a graphical interface, use Brian Hill's freeware utility MacJanitor (http://personalpages.tds.net/~brian_hill). Simply launch



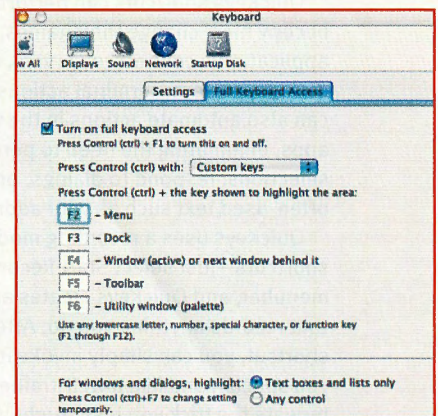
MacJanitor enables non-Unix types to run the built-in diagnostic tools at the heart of Mac OS X.

MacJanitor, click a cron job, and watch as your Mac runs through dozens of system-performance tweaks.

► Go F1 Yourself

Some tasks just work better with a keyboard shortcut. Don't waste your time moving your hand between keyboard and mouse to hop to the menubar or click the Dock—let your fingers do the walking instead. Take a trip to the Keyboard system preference. Click the Full Keyboard Access tab, select Turn On Full Keyboard Access, and then use your Mac's often-overlooked function keys and the Control key to toggle windows, jump to toolbars, navigate palettes, and jump directly to the menubar or Dock, which you can then move through using the arrow keys. If you've already assigned your function keys to other tasks, you can either use a predefined set of letters (Control-M to jump to the menu or Control-D to jump to the Dock, for example) or choose your own custom key combinations.

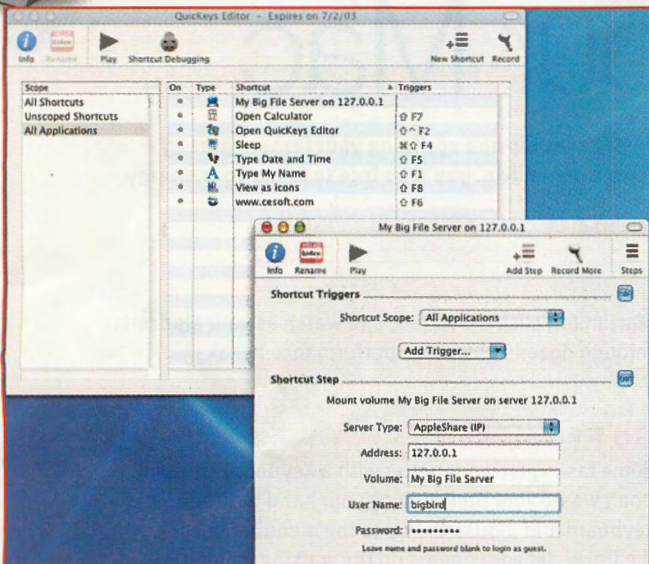
If you have an iBook or a PowerBook, you must also press the *fn* key in the lower-left corner of your keyboard along with the appropriate function key or user-defined shortcut. This may sound a bit inelegant, but it's still easier than dealing with a moody trackpad.



If your fingers are faster than your mouse, Full Keyboard Access can make you more efficient.

► Make Your Keys Quick

There is also another, more ingenious way to make use of those function keys—or any key, for that matter. CE Software has brought QuicKeys up to speed for OS X: QuicKeys X2 (\$99.95, www.quickeys.com) breathes new life into this venerable app. QuicKeys X2 lets you define *macros*—sets of actions that automatically perform functions when you trigger them—for most common Mac and Mac-app functions. You can trigger



QuickKey's claim to fame is its ability to eliminate repetitive tasks, such as logging into a file server.

these macros—called *shortcuts* in QuickKeys parlance—with keystrokes when you launch an application, or set them to run on a regular basis.

QuickKeys shortcuts can perform Finder tasks (move or copy files, change their names, switch between applications, connect to servers, and so on), respond to dialogs, perform Terminal actions, and more. QuickKeys can also automate actions in the vast majority of Mac apps, eliminating the need to perform repetitive menu selections, respond to dialogs, or type large chunks of often-used text such as your address.

QuickKeys uses a recording mode to create its shortcuts—just select Start Recording Me from the menubar, and QuickKeys creates an editable shortcut that records anything you do. After creating the shortcut, you can simply invoke it with the trigger you specify, and like a well-trained doggie, QuickKeys repeats the trick you just taught it. Even better, QuickKeys shortcuts are scriptable, letting you quickly chain together multiple shortcuts, complete with looping and pauses for interaction.

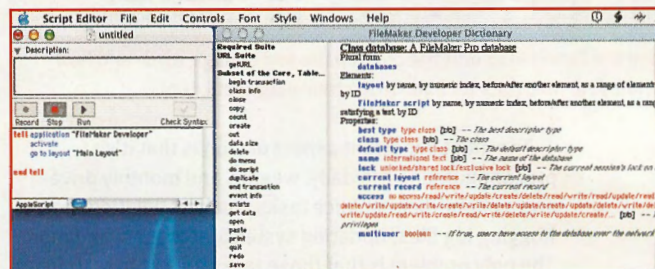
One of QuickKeys' greatest strengths is its ability to trigger AppleScripts—more on that in a moment—which allows it to work as the front end for any number of Mac automation tasks.

► Script Everything

Without doubt, the most powerful and complex tool for the Mac automation junkie is AppleScript. Part programming language, part macro-maker, AppleScript has been an integral component of the Mac since System 7 was released way back in 1990. When OS X first shipped, its AppleScript support—to put it as kindly as possible—sucked. Revisions have improved it enormously. In its Jaguar incarnation, AppleScript can exploit more features in OS X than it could in OS 9. AppleScript also contains a wealth of conditional and branching logic tools that macro-creation software like QuickKeys can't touch—although QuickKeys can leverage the power of AppleScript by triggering scripts within its own shortcuts.

The great thing about AppleScript is that it works fluidly between applications and your Mac's operating system—a single script, for example, can rename a folder full of images, launch Photoshop and instruct it to resize every image, and then save those images to another location. You can save scripts as stand-alone applications that you launch by double-clicking them or using Terminal commands.

It's even possible to control multiple remote Macs



Take control of your Mac with AppleScript, a powerful scripting app built into every Mac and capable of automating nearly every facet of your Mac activities.

ESSENTIALS

Scripting Resources

If you'd like to use automated scripts but don't want to write them, there are plenty of online resources.

- A good place to start is Apple's **AppleScript Resources** site (www.apple.com/applescript/resources).
- **MacScripter.Net** (www.macscripter.net) offers a great selection of downloadable tools, plus teaching resources and a community based around AppleScript.
- **Late Night Software** also offers some wonderful AppleScript resources

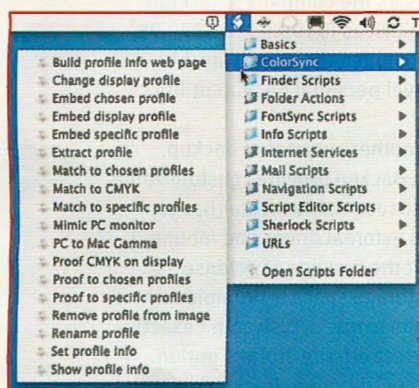
(www.latenightsw.com/scripting.html) and covers a variety of other programming environments as well.

- If you want to explore X10, you can get your feet wet at **Perceptive Automation** (www.perceptiveautomation.com), which provides a basic tutorial on home automation, including a description of products and where to find them, as well as an online support forum.

using AppleScript. To allow an AppleScript sent by a remote Mac to control your Mac, open the Sharing pane in System Preferences and check the Remote Apple Events box in the Services tab. Remote control is a handy feature for a network administrator or a home user who works with multiple Macs. A network administrator could, for example, write scripts that shut down a computer center's machines at the end of the day, or that trigger all Macs sharing a network to check for software updates. A home user could instruct a central Mac to launch iTunes or activate file sharing on all Macs on a home network. Remember, however, that Remote Apple Events trades security for convenience, so activate this feature only when necessary.

It's much simpler to learn AppleScript than a programming language such as Java or Perl—AppleScript is an automation technology accessible to mere humans. Using Script Editor (Applications > AppleScript), you can

write simple English-based instructions that control both the applications and the OS. Each AppleScriptable application (nearly every app on your Mac) contains a dictionary of terms called, appropriately enough, Dictionary, which AppleScript can use to automate that app. To explore an app's Dictionary, launch Script Editor, choose Open Dictionary from



Install the AppleScript menu and you'll have a convenient place to access any AppleScript, such as these provided by Apple.

the File menu, then wait a moment while Script Editor tracks down all the apps on your mounted volumes and presents you with a list. Select the app you want to automate, click Open, and Script Editor launches the chosen app and presents you with a list of its AppleScriptable commands.

For the hard-core programmer, Apple offers AppleScript Studio, a design tool that integrates with Script Editor and other programming tools such as Interface Builder, Project Builder, and the Cocoa application framework, all in a single application-development environment. An ambitious developer could use AppleScript to write what would appear to the user to be a full-fledged, compiled app—though, as it's interpreted rather than compiled, it would run rather slowly. If you want to try your hand at using this simple but powerful tool, look for AppleScript Studio on the Developer CD that's included with all copies of Jaguar (Apple's not saying yet whether it will ship a Developer CD with Panther).

Apple includes a few dozen scripts in the Applications >

AppleScript > Example Scripts folder (which is actually an alias to Library > Scripts). There you can find AppleScripts for both basic (Open Script Editor) and complex (Proof CMYK On Display) functions. You can gain access to these scripts without making multiple trips to the Finder. Simply drag the Script Menu.menu folder from the AppleScript folder to the menubar, where a new icon will appear—click it for immediate access to your AppleScripts.

QUICKIE

Get Started with AppleScript

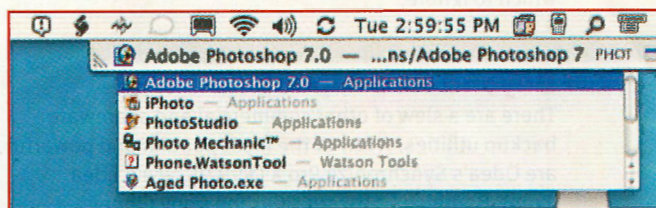
One of this month's how-to articles, "Make AppleScript Do Your Dirty Work," p66, provides five pages of examples showing you how to create easy and useful AppleScripts.

Grab a Bit of Launch

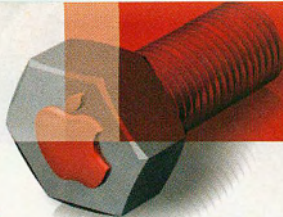
The Finder is pretty efficient, but it's still annoying to hunt for an app buried in the Applications folder, or to search for the Word document that contains your company's fax cover sheet—is it in your Office Stuff, Fax, or Ugly Docs folder?

Instead of enduring hide-and-seek navigation, immediately grab this month's Disc and install Objective Development's shareware app, LaunchBar (\$19.95 home, \$39 business, www.obdev.at). LaunchBar enables app- and file-launching that's so intuitive, smart, and powerful, it should be part of OS X. When LaunchBar is running in the background, all you have to do is press Command-space bar (or a key combination of your choice), and LaunchBar's drop-down menu appears below your menubar. Type the first few letters in the name of the item you're looking for, and LaunchBar's sophisticated smarts present you with an intelligently selected list of files, apps, bookmarked Web pages, contacts, and so on. When you find what you need, select it using either the arrow keys or your mouse, then press Enter to launch it. Slick!

LaunchBar will learn your preferred abbreviations on its own (or you can train it yourself) so that you can launch Photoshop, if you wish, by simply typing *ps*. What's more, it's smart enough to present you with a list that also includes your bookmark to www.psychologytoday.com and that old Psilocybin Research spreadsheet, just in case you have other work on your agenda.



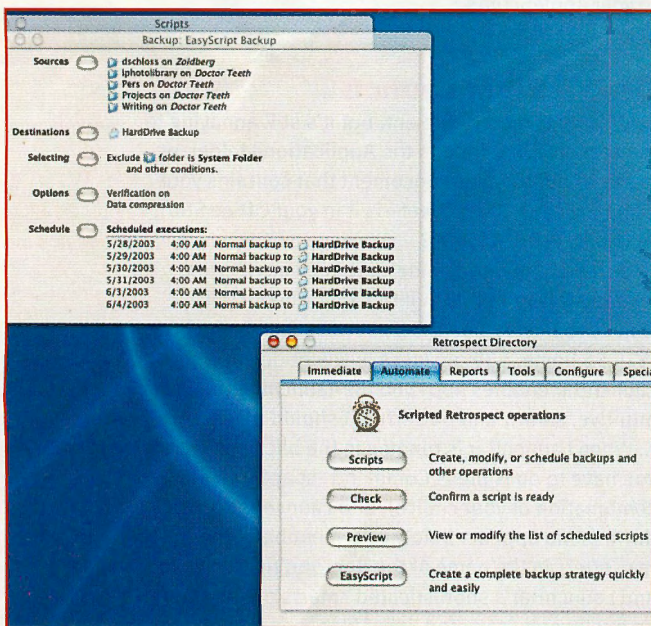
LaunchBar, an indispensable shareware app, adds keyboard shortcuts to programs, files, bookmarks, and contacts—all from an innocuous little menubar item (upper right).



► Use It or Lose It

The number one reason for data loss is laziness. Most people don't back up because copying information from one drive to another is *sooo* tedious. But re-creating months or years of work is even more so.

Backup is the number one candidate for automation. The longtime heavyweight champ of backup and restoration is Dantz Retrospect (pricing varies, www.dantz.com); versions range from a single-user Express version—which comes bundled with backup drives such as CD-R/RWs, DVD-Rs, tape drives, and external hard drives—all the way up to IT-level Server packages that'll back up whole networks.



Retrospect can schedule backup to just about any storage device, and can exclude or include files based on dozens of criteria.

In addition to rock-solid security, Retrospect's claim to fame is its ultrasimple, wizard-based configuration tool, EasyScript. An EasyScript takes only a minute to create, and by default it regularly schedules a backup that backs up everything from every one of your drives to the storage media of your choice. EasyScripts are completely customizable—you can use dozens of criteria to decide exactly which files to back up and which to ignore.

► Beyond Retrospect

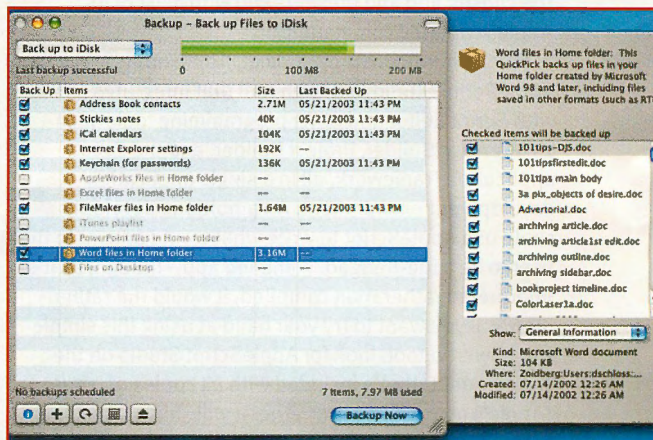
There are a slew of other commercial and shareware backup utilities. A few of the most popular and powerful are Qdea's Synchronize Pro X (\$99.95, www.qdea.com), Bombich Software's Carbon Copy Cloner (donationware, www.bombich.com), and Déjà Vu (\$14.95, <http://propagandaprod.com>), all of which back up data and can create a complete clone of your

system, from which you can boot in case of an emergency—a trick Retrospect couldn't manage until its recent version 5.1 upgrade. Carbon Copy Cloner also allows you to create a bootable backup CD, a potential lifesaver.

CMS Peripherals takes a different approach to backup with its line of hard drives bundled with CMS's easy-to-use ABSplus backup software (\$299 to \$599, www.cmsproducts.com; see *Reviews*, p60). Simply plug in the FireWire device and watch as it creates a complete, bootable backup of any system. CMS's line of slim, portable, bus-powered drives come in especially handy on the road and offer the same complete bootable-cloning abilities as the company's desktop units. Maxtor's OneTouch Drives (\$199.95 to \$399.95, www.maxtor.com) operate much the same way, but they use Dantz's entry-level personal backup utility, Retrospect Express.

.Mac customers have another automated backup option: the Backup utility. Backup provides customizable archiving to your iDisk or to recordable media (Backup 2 will be able to backup to external drives and mounted volumes). It's certainly not the first line of defense against data loss—.Mac storage space is prohibitively expensive, and connections to one's iDisk aren't exactly blazingly fast—but it's a great off-site storage option.

Rather than back up an entire drive, Backup defaults to storing commonly modified files such as Address Book contacts, iCal calendars, Keychain entries, Word documents, and other crucial files using a selection process called QuickPicks. Instead of backing up everything in specific folders, for example, QuickPicks allows you to grab, say, only the Word files in your Documents folder. You can also schedule your backup to .Mac on a daily or weekly basis.



Use .Mac's Backup to back up groups of files and folders quickly.

QUICKIE

Launch Your Apps Automatically

Open the Login Items pane of System Preferences, click Add, browse to any applications you want to launch at startup or login, and then add them to the Login Items list. Now, each time your Mac starts up or you log in, your favorite apps will be ready and waiting.

Automate Your Apps

Now that your Mac is chugging along smoothly, take a look at your apps. Do you spend most of your time working in a few of the more-popular apps? Many have built-in automation tools just waiting for you to unleash them.

► Photoshop

Photoshop is the most powerful image-editing app in the universe, but with great power comes great boredom. There is probably no time-suck more intensely soporific than opening a folder full of images and applying the same changes over and over. And over. And over again.

Fortunately, there are several different ways to automate Photoshop. You may have already stumbled across the Automate menu item in the File menu. Select it, and you'll see

a number of tools designed to streamline image-editing tasks. The Web Photo Gallery option, for example, creates a Web-ready gallery, complete with thumbnails, from a folder of images.

Also useful are Contact Sheet II, which creates a printable contact sheet from a folder of images, and MultiPage PDF To PSD, which converts a multipage PDF file into a series of Photoshop files. Picture Package creates a printable sheet of various-size images—you can, for example, print out a 5 by 7 of a favorite photo plus eight wallet-size images, all on the same preformatted 8 by 10 sheet.

The functionality tucked inside the Automate menu only hints at Photoshop's real timesaving power. Its Batch and Create Droplet choices are powerful tools in the fight against drudgery. A *batch process* performs a set of automated actions on a folder of images, avoiding the tedium of opening each file and performing the same actions on each one. A *droplet* is a stand-alone miniapplication that waits until you drag and drop files onto it, and then performs a designated set of actions on those files.

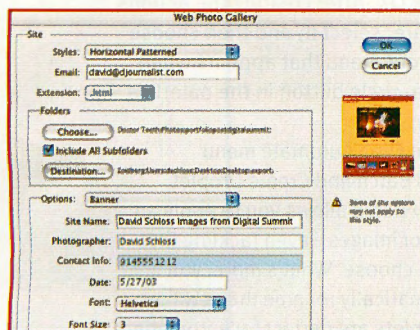
Both batch processing and droplets are cool, yes—but of no value until you've created something to batch process *with* or created a self-launching droplet *from*. In Photoshop, these automated actions—Photoshop's macros—are called, unsurprisingly, Actions. The

Actions palette (Windows > Actions) is the superstar of Photoshop automation, and comes preloaded with dozens of step-by-step Actions that automate processes ranging from the simple to the complex.

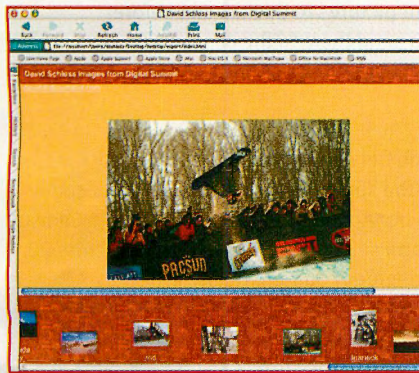
You'll find many of these supplied Actions in the Default Actions.atn folder (an .atn folder is also known as a *set*), which is already loaded in Photoshop's Actions palette. Some of these default Actions, such as Molten Lead, apply a series of filters and layer effects to a selection. Others, such as Water Reflection, modify text elements. Regardless of their effect, all Actions work the same way: They perform a series of steps in a specific order.

In the Action palette, select an Action and then click the play button (the triangle in a square). You don't even have to start at the beginning of the Action—select any step and click play, and Photoshop will work its way through the subsequent steps until the job is done. You can also skip individual steps by unchecking their boxes—and don't worry about accidentally unchecking a critical one: Photoshop will display an error message if it reaches a step that's dependent upon the unchecked one.

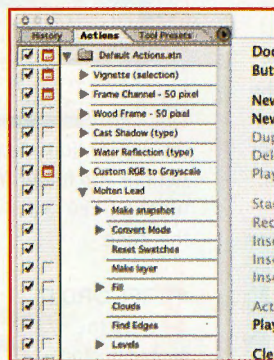
Additional default actions are stored in Applications > Adobe



Photoshop's Web Photo Gallery tool (above) quickly creates professional-looking Web pages (below) from a folder of images.



Turn your Mac into a portrait studio using Photoshop's Picture Package.



There's a lot more to Photoshop Actions than the default set—you can load even more included categories or create your own Actions.

Photoshop 7 > Presets > Photoshop Actions, in folders grouped by categories. Don't waste your precious time navigating to them, however—this is all about automation, remember? Simply load the ones you want in the Actions palette by opening the flyout menu (click the triangle-in-a-circle in the palette's upper-right corner), then selecting actions from the sets (which end in .atn) at the bottom of the list that appears.

Default Actions are all well and good, but the real power lies in creating your own Actions (see "Rotate

Photos Using a Photoshop Action," below). You can edit your Actions as well.

For example, if you forget a few steps, simply select the step after which you'd like to add some activity,

click the record button (the circle in a square), perform the missing steps, and click the stop button (the square in a square) when you're done. If you need to edit a step, double-click the step you want to change and redo that step.

Actions are saved automatically into the Actions palette, but you can also save them as a separate file—to share with other users, for example. You must save an entire set, however, so it's a good idea to create



You can easily create Actions in Photoshop and assign them to any available function key for one-keystroke access.

a separate set that contains only the Actions you want to share. To do so, click the folder icon at the bottom of the Actions palette, enter a name for the set in the resulting dialog, and click OK. After creating the Actions in the set you want to share, select it, and then choose Save Actions from the flyout menu that appears when you click the triangle-in-a-circle button in the palette's upper-right corner.

Now let's go back to the File > Automate menu and revisit our old friends Batch and Create Droplet. Selecting File > Automate > Batch allows you to apply an Action to an entire folder of images—even tackling that folder's subfolders, if you choose. What's more, you can automatically rename the new files.

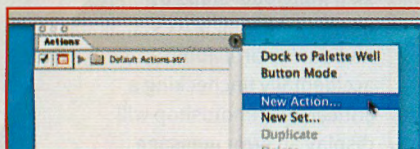
Droplets are perfect for automating a complex series of events for someone who isn't familiar with Photoshop—just tell them, "Drag your pictures to this droplet before you send them to the client."

ROTATE PHOTOS USING A PHOTOSHOP ACTION

A common use for Photoshop Actions is to change the orientation of photos—not a tough task in and of itself, but a tedious one when you're reorienting a folder full of them. Here's how to create an Action that'll automate that humdrum task.

1 PICK IT

In Photoshop, open a photo you want to correct. Make sure the Actions palette is showing—if it isn't, choose Actions from the Window menu. In the flyout menu (click the triangle-in-a-circle in the upper-right corner of the Actions palette), choose New Action.



2 NAME IT

Give the action a name in the resulting dialog. You can create a new Actions set by clicking the folder icon at the bottom of the palette, but in this case we'll create



the new Action and place it in the Default Actions.atn folder. You can also assign a function-key to activate the action—F10 in this case.

3 RECORD IT

Click the record button (the circle in a square) at the bottom of the Actions palette—whatever you



do between now and when you click stop (the square within a square) will become your Action. Choose Image > Rotate Canvas, and select 90° CCW to turn the picture 90 degrees counterclockwise.

4 STOP IT

Click the stop button at the bottom of the Actions palette to end recording.



5 RUN IT ONCE

There are several ways to use this new Action. To apply it to a single image, open another photo, click the name of the Action, click the play button at the bottom of the Actions palette, and watch the photo rotate automatically.

► FileMaker Pro

The multiplatform database champion FileMaker Pro is a powerful application, yet its basic functions are simple enough so that even beginners can cobble together functional databases in short order.

The problem with many databases is that they contain so *much* data that they're hard to manage. Luckily, FileMaker Pro is blessed with one of the most adept automation tools around: ScriptMaker, which database developers use to control any aspect of a FileMaker Pro database with a script. More of a select-items-from-a-list, building-block approach than a write-your-own-code scripting language, FileMaker's scripts are easy to create—and the built-in Help has detailed instructions on every script step.

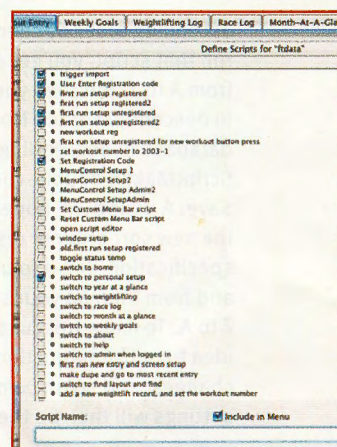
You can easily access ScriptMaker from FileMaker's Scripts menu: It'll be the first and only item that appears in that menu until you start creating scripts (then you can

choose to have those appear there as well). ScriptMaker's interface is a dialog with two panes—all of FileMaker's functions run down the left, and a blank space where you create the script is on the right. (FileMaker's Developer version makes script creation even easier by including a handy debugging tool.)

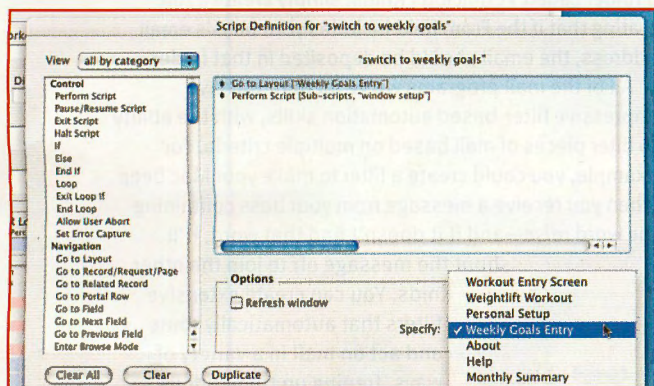
To add a script step, double-click the function you'd like to use in the left pane; it will appear in the right pane. Repeat this process for any additional steps. If you want to create a script that makes FileMaker switch to a layout named Employees and then sort by Last Name, for example, double-click the Go To Layout function to add it to the right pane. Since this function contains a choice of variables, a pop-up menu appears in the lower-right corner of the dialog listing the choices available—in this case, the available layouts.

After selecting the correct layout, go back to the left column and double-click Sort. You may notice that one of the options offered is Restore Sort Order—this hints at ScriptMaker's intelligence. ScriptMaker not only keeps track of database settings such as sort order, it also tracks the *changes* made to those settings after you create a script, and makes it easy to apply these new settings to your script.

For example, let's say you have a client database, and you create a script that sorts the records in



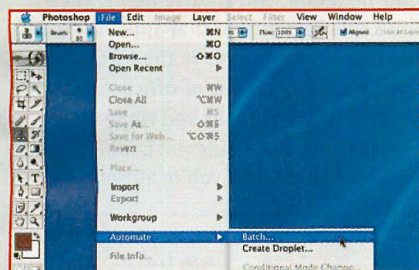
The first thing you see when you fire up ScriptMaker is a list of all available scripts—the ones checked show up in the Script menu.



ScriptMaker is smart enough to present you with a list of options if the function you choose requires specific information—such as which layout to use.

6 CREATE A BATCH

To run your new Action on an entire folder, first select Batch under File > Automate.



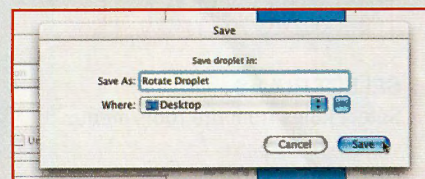
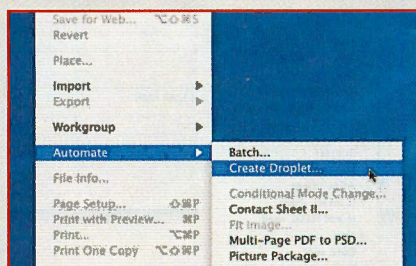
7 RUN YOUR BATCH

Select the action set—in this case it's the Default Actions.atn folder—then the Action to apply. Make sure the Source field is set to Folder, then click Choose

and navigate to your folder full of images. Then click OK to fire up your Action.

8 CREATE A DROPLET

The coolest way to run an Action is to create a droplet, a little app that launches Photoshop and performs an Action on any file or folder dropped onto it. First, choose File > Automate > Create Droplet.



9 SAVE YOUR DROPLET

Next, choose a location in which to save the droplet.

10 RUN YOUR DROPLET

Finally, select the Action just as you did with the Batch command, then click OK. Then simply drag files or folders onto the Droplet icon to activate the Action.

ascending order by clients' last names. Any time you run that script, you get a file sorted by last name from A to Z. But then you realize you need the file in descending order. No problem—simply sort the database in descending order, and then open up ScriptMaker, double-click the script to edit it, and click Save. A dialog will appear, asking if you want to use the new sort order or restore the order to your original specification. Tell it to use the new sort-order setting, and from then on your script will sort last names from Z to A. To make best use of this capability, it's a good idea to perform functions such as sorts, finds, layout changes, and so on *before* creating a script—those settings will then be the defaults.

► Email

Several industrial-strength email applications have automation tools designed to deal with your ever-growing stream of inbound mail. While these mail-handling—also known as mail-filtering—tools are all slightly different, they have many aspects in common.

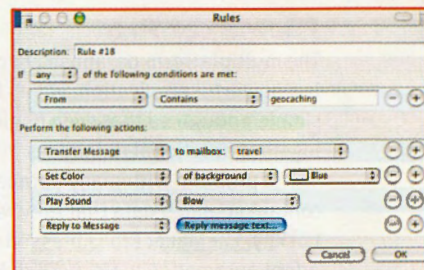
Microsoft Entourage X's (\$99, www.mactopia.com) mail-handling tools, called Rules, are located in its Tools menu. Apple's Mail (included with Mac OS X; \$129, www.apple.com) stores them in Mail > Preferences—click the Rules tab. Mailsmith (\$99,

www.barebones.com) has a sophisticated set of filters located in Window > Mail Filters. PowerMail (\$49, www.ctmdev.com) stashes its Mail Filters in the Setup menu, and Eudora (free, www.eudora.com) stores them in Window > Filters.

Although all mail-filtering tools have differences, they all follow the same basic setup procedure. You first define a criterion—such as the name of a sender or a particular word or phrase in the subject—and then define an action to perform when that criterion is met. For example, to make all the email from your boss go into a folder called Vermicious Knids, simply create a rule stating that if the From field includes your boss's email address, the email should be deposited in that folder.

All of the mail programs we've mentioned have impressive filter-based automation skills, with the ability to filter pieces of mail based on multiple criteria. For example, you could create a filter to make your Mac beep when you receive a message from your boss containing the word *raise*—and if it doesn't find that word, it'll

shunt the message off to join the other Knids. You can create extensive filters that automatically route and act on mail in a variety of ways, freeing up tremendous amounts of your precious time.



Apple's Mail app has an easy-to-manage set of mail-handling rules.

CREATE AN OUT-OF-OFFICE AUTOREPLY

Using the automation tools built into Mail and Entourage, you can automate your email even on days when you're not at work. Creating an out-of-office autoreply is a good way to feel the power of a rule at work. Here's how.

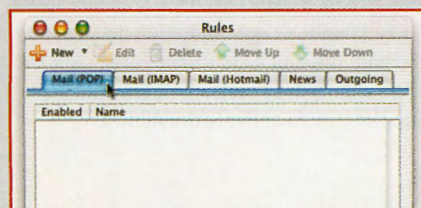
ENTOURAGE

1 SELECT RULES

Select Rules from the Tools menu.

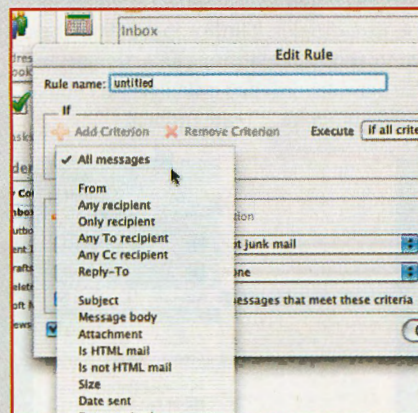
2 CHOOSE YOUR SERVER

The Rules palette appears; here you can create rules for different types of mail and news servers. Click the tab for your type of mail server (POP, IMAP, or Hotmail), and then click New.



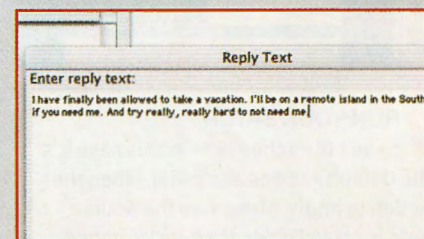
3 SELECT ALL MESSAGES

In the If area at the top of the Edit Rule dialog (where you select the criteria that trigger an action), make sure to select All Messages.



4 FINISH UP

The default Then area contains two actions, but we only need one for this rule. Choose Reply from the Change Status pop-up menu, and choose Reply. Click the Reply Text button that appears next to the pop-up menu, and in the text box that appears, enter an out-of-office message for anyone who emails you *while you're* on vacation. Make sure the Enabled check box is selected, and you're all set.



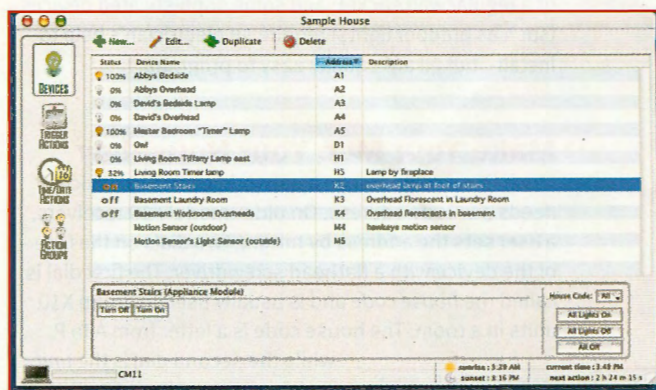
Automate Your Home

So far we've shown you how to make life with your Mac and its apps faster, smarter, and easier. Now it's time to reach beyond that 1,280-by-1,024-pixel world (or 1,920 by 1,200, if you're lucky enough to have a Cinema HD Display), and let your Mac make your entire life more comfortable and convenient.

► Turn On Your Home

Home automation, once the kludgy domain of the übergeek, is now sleek and sexy. Thanks to recent improvements in both hardware and software, it's possible to use your Mac to automate nearly everything that goes on in your home. Well, maybe not everything—we liveware units are notoriously hard to control—but your Mac can manage an astonishingly large number of electrically and electronically controlled activities.

Long before digital home networks became popular, electronic tinkerers came up with a way to send analog signals over a home's standard electrical wiring in the form of slight fluctuations in the current, and a home-control standard named X10 was born. This open-source standard is now used by dozens of companies to create a wide range of home-automation devices that can dim your lights, water your garden, catch your roommate stealing your Bud Lite, and much more. Check out www.smarthome.com and www.x10.com to get an idea of the possibilities. All of these devices are managed by other devices called transceivers, which send commands and receive feedback from the X10 units—and your Mac can control these transceivers.



Using the Mac-based X10 setup app Indigo, you can configure individual X10 devices in your home. Each device controls one lamp or appliance.

The simplest X10 devices, such as basic on/off switches, cost around \$10 apiece. Complex programmable light dimmers and appliance units can cost over \$100, and devices around \$30 can dim your lights in addition to just turning them on and off. Most devices in the \$30-and-up range include the ability to communicate with a transceiver. The most expensive units replace existing light fixtures or home-theater

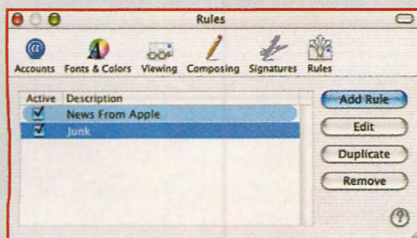
MAIL

1 SELECT PREFERENCES

Creating an automated response in Mail is just as easy as it is in Entourage. Start by selecting Mail > Preferences.

2 ADD A RULE

Click the Rules button, then the Add Rule button.

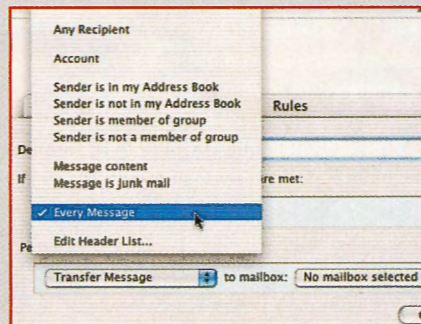


3 NAME YOUR RULE

Give your new rule a name, then make sure Any is selected in the If pop-up menu.

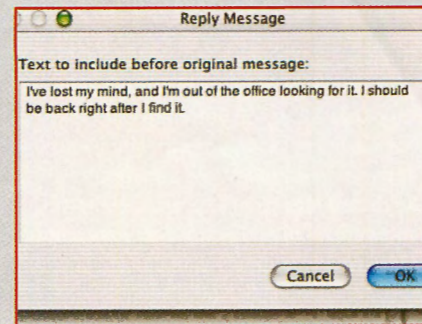
4 SELECT EVERY MESSAGE

Select the pop-up menu below the If pop-up menu, and change it to Every Message.



5 FINISH UP

In the Perform The Following Actions area, select Reply To Message, and then click the Reply Message Text button that appears. Type some witty message in the resulting text box, click that box's OK button, click OK in the Rules dialog to save your filter—then have a nice vacation.



control systems and include their own built-in computers.

A variety of wireless X10 devices are also available, such as light switches that affix to the wall without a direct electrical connection, and those wireless spy cams you've seen in pop-up ads. Wireless devices require a wireless receiver that plugs into an electrical outlet.

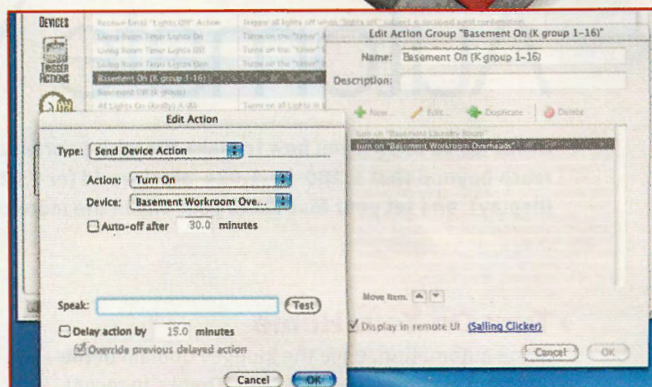
Many X10 devices (such as appliance controls) plug into existing outlets; light switches (even the most complicated programmable kinds) simply install in place of a regular wall socket; and some sophisticated devices (such as outdoor lights) require an electrician's help to install—but all are equally easy to program.

► Make Your Mac Your Houseboy

Much like a computer on a network, each X10 device needs a unique address. On older-model X10 receivers, a user sets the address by turning two dials on the face of the device with a flathead screwdriver. The first dial is called the *house code* and is usually used to group X10 units in a room. The house code is a letter from A to P,

while the second dial is the *unit code*—a number from 1 to 9. You might decide, for example, to set all the devices in your bedroom to house code A, and then set your bedside lamp to unit 1, your table lamp to unit 2, and so on. Then you might set all the lights in the living room to house code B. In newer devices, these addresses are programmable via buttons or remote control.

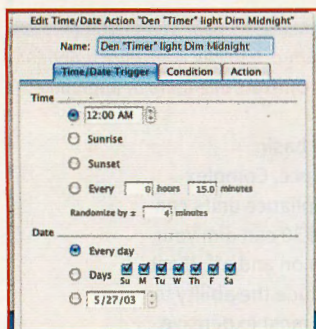
When X10 first came out, you had to control all the devices via a hardware transceiver unit—a programmable remote control that sent signals out to each X10 unit, either by their specific address (A1,



Indigo's Action Groups allow a series of events to occur at the same time. Here, Indigo is set to turn on all the lights in the basement when someone flips a light switch in the stairwell.

for example) or to a house code (just B, for example). Older transceivers could, for example, turn on all units in house code B, and turn off the unit at A1. Thanks to modern transceivers that connect to a computer (first via a serial adapter, and now via USB), such as the PowerLinc USB (\$34.99, www.smarthome.com), it's now possible to control X10 devices via software. The app of choice for any Mac-based X10 setup is Perceptive Automation's Indigo (\$89.95, www.perceptiveautomation.com)—a superb OS X app that provides a deep level of control, transforming X10 from an elaborate parlor trick into a useful tool.

Indigo, like its peecce cousins, uses a transceiver such as the USB-based PowerLinc or an older serial version that requires a USB-to-serial adapter, like Keyspan's (starting at \$69.99, www.keyspan.com). These transceivers send signals to the X10 devices scattered throughout your home. Indigo sends a command signal—called an *action*—to the transceiver, which in turn sends the action to the devices over the electrical wiring in your home and interprets any signals sent back from the X10 device. For example, you could program Indigo to



Time-and-date actions in Indigo occur at times you specify. Set a lamp to turn on at 9 p.m. on weekends or program your coffeepot to start brewing at 7 a.m. on weekdays.

ESSENTIALS Scripting Tools

You need just a few basic tools to automate your Mac. A great place to start is with **QuickKeys X2**, by CE Software (\$99.95, www.quickkeys.com), or with shareware apps such as ClaireWare Software's **Keyboard Maestro** (\$20, www.claireware.com) and Script Software's **iKey** (\$20, www.scriptsoftware.com).
• Apple includes **ScriptEditor** on

all shipping Macs (Applications > AppleScript), which you can use to perform basic scripting functions, syntax checking, and debugging.
• Apple's Developer Tools CD—included with Jaguar's installation CDs—includes **AppleScript Studio**, an integrated development tool that interacts with **Project Builder**, **InterfaceBuilder**, and other Cocoa development tools. With these apps it's possible to create a complete runtime program that looks and feels like a Cocoa application, but is powered by AppleScript.

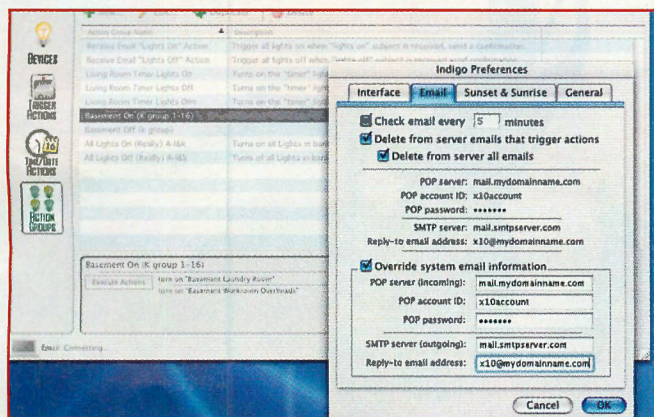
- **Cocoa Dev Central** (www.cocoadevcentral.com) offers an excellent tutorial on AppleScript Studio, and on all other aspects of Mac programming.
- Bare Bones Software's all-around excellent **BEdit 7.0** (\$179, www.barebones.com) supports full-featured tools for writing AppleScripts—or for coding in any other programming language, for that matter.
- Perceptive Automation's **Indigo** (\$89.95, www.perceptiveautomation.com) is the de facto standard in Mac OS X-based X10 deployment.

tell your bedroom light to turn on at 9 p.m., then wait for a response from the lamp module confirming that the light had indeed turned on.

Indigo can control X10 devices based on triggers from a variety of sources—for example, when someone turns on a light manually, when a motion detector is triggered, when Indigo receives email via its built-in mail server, or when the clock strikes midnight. Indigo even knows when the sun rises and sets, so it can send actions at varying times from season to season.

It's also possible to set up a series of actions (called Action Groups) that are triggered by other actions. For example, if Indigo receives a signal that a light over the bathtub has been turned on, it can run a series of actions to dim the lights in the bathroom to 50 percent, turn up the temperature in that room, and activate the Jacuzzi jets.

Indigo's built-in mail app scans any POP mail account



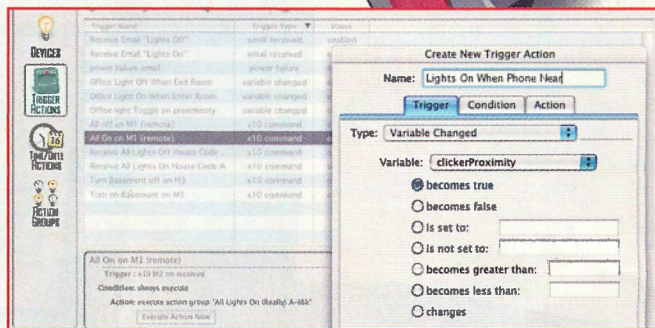
Indigo's powerful built-in mail program monitors any POP account for action-triggering emails.

for email with subjects you've defined; if it finds these subjects, it then triggers the actions you've specified. Indigo will check mail at the frequency you define and launch actions when it finds any matching criteria. In the bathroom example above, you could trigger the actions just by sending an email with the subject line "Draw my bath, Jeeves" as you're leaving work.

► AppleScript Your Life

Indigo is AppleScriptable, so it's possible to create scripts that trigger actions in your home. An AppleScript could go online and check the weather, and tell Indigo to turn on the air conditioner if the temperature is above 90 degrees. Conversely, Indigo could wait for a signal that the coffeepot has turned on, and then launch Mail, iChat, and Word so your Mac is ready for you after you get your caffeine fix.

Indigo can also launch AppleScripts with an action—you could, for example, tell Retrospect to begin backing up at 6 p.m. on Friday night, and then have Indigo send your phone



Working in conjunction with Salling Clicker, Indigo can sense the proximity of a Bluetooth device and trigger events when the device comes near your Mac or leaves the area.

an email confirming when your Mac has completed that all-important task.

The possibilities are endless. You could program Indigo to turn on all the lights in your home to full brightness in response to an email with a "Light 'em up!" subject line, then have Indigo send you an email confirming that the lights are all on. Before you leave on vacation, you could set a daily action to turn on the lights in your home two hours before sunset—with a variability in their activation time to fool burglars—then dim them to 20 percent at midnight and shut them off at sunrise. Your party guests will appreciate an AppleScript that sets the lights to a pleasing level, turns on your outside lights to full brightness, and fires up your favorite iTunes party mix. Your garden flowers will appreciate receiving extra water on hot days in response to an SMS (Short Messaging System—a text-message service offered by GSM mobile-phone providers) message titled "Deluge" that you send to your email address, triggering your sprinkler system to go on.

The combination of X10 and a cell phone such as the Sony Ericsson T68 offers more possibilities than merely keeping your petunias moist. Using Salling Clicker (\$9.95, <http://homepage.mac.com/jonassalling/Shareware/Clicker>) software, you can trigger X10 events simply by walking close to a Bluetooth-equipped computer with a Bluetooth phone turned on in your pocket. For instance, you could turn on your photocopier, espresso brewer, printer, and fax machine by just walking into your office. Clicker can also trigger iTunes, run Keynote presentations, control X10 via Indigo's proximity and script-aware actions, and trigger AppleScripts.

Home automation, application automation, Mac automation—they all can save you countless hours of unnecessarily redundant repetitions of the same tasks over and over and over again all the time in superfluous, unnecessary, repetitive, recapitulatory, iterative homage to the Department of Redundancy Department. So take a few minutes to automate your workflow. Then go out and play some Frisbee. ■



David Schloss is the technology editor at *Photo District News* and the editorial director at Blue Pixel. His house code is C and his unit code is 5, if you want to turn him on.



MacAddict's Ultimate Home Office

by Robert Capps with photography by Mark Madeo



Office v.X Test Drive,
ThinkFree Office
2.2 trial, First Edge
1.0r5.7.2 trial, and
SilverKeeper 1.1



Thanks to broadband, working from home is no longer a pipe dream. We can now stumble from bed to desk to productivity in five minutes or less—free from the annoyances of long commutes, inane water-cooler conversation, hygiene-challenged coworkers, or even pants.

We hunted down the top Mac hardware and software to create the ideal live-work palace—a \$7,831.84 productivity-inducing wonderland. With this setup, you may never go into the real office again. In case you're looking to retain a bit more of your home-earned cash, we include less-pricey options in each product category—as well as recommendations for the Big Spender looking to grossly supersize his or her home office. We also give you tips on setting up your space, networking, and lots more.

Welcome to the magnificent world where you can enjoy all the benefits of the office without, well, the office. No shirt, no shoes, no shower required.

The Ultimate System

System

To us, *ultimate* means a desktop-laptop combo—the power of a desktop and the luxury of a 20-inch display, plus a solid mobile system to take on the road for business-related travel, shuttling back and forth to another office, or heading to the local coffee shop. We'd be remiss if we didn't pick up a new G5—our choice was the midlevel 1.8GHz Power Mac (see *Reviews*, p44), complete with a 160GB hard drive and 512MB of RAM, but costing \$600 less than the Dual 2GHz model (if you're a graphic designer, we suggest upping the RAM to at least 1GB—an extra \$250—to help

run your apps). For our laptop we chose the 12-inch PowerBook sans SuperDrive (but with an AirPort Extreme card) because it's small, light, and powerful—and we already have a SuperDrive in our G5. We picked Apple's 20-inch display for its reasonable price, good performance, single cord, and overall handsomeness.

If you work mostly at a desk, our budget-conscious system recommendation is the 17-inch iMac, which gives you a complete Mac package plus enough onscreen

elbow room to shuffle spreadsheets, browsers, email messages, text files, and accounting reports. If you find yourself frequently on the move, then go completely mobile with a potent yet compact 12-inch PowerBook. Because 12 inches of desktop space can get cramped, consider adding an external monitor for home use. The Sharp LL-T17D3 display is our top pick for a 17-inch flat screen (see "Sexy at

17," Jun/03, p28), offering great image quality at a good price.

If your middle name is *Moneybags*, it's time to ante up! Two 23-inch monitors plus a Dual 2GHz desktop equals a heightened ability to multitask—handy if you need room for multiple editing windows and tool palettes in Final Cut Pro or if you need to jump between Adobe Illustrator, Photoshop, and InDesign to finesse your graphic opus. The 17-inch PowerBook gives you powerful mobility. Just keep in mind that this setup will cost you as much as a small economy car—and will probably be top of the line for all of six months.

Printer, Scanner, and Fax

For printing, scanning, and faxing, we opted for an all-in-one machine—it takes up less space, hogs only one port on your Mac, acts as a copy machine, and is generally a better value than separate devices. We still had some tough decisions to make, though: sheet-fed or full flatbed scanning (we chose flatbed for versatility), fax or no fax (we chose fax—it's handy), and, most significant, laser or inkjet (we chose laser). Sure, we're stuck in black and white when it comes to output, but laser printers are faster, create sharper text, and cost you less per page than their inkjet counterparts, making them perfect for office use.

We liked both Brother's MFC-8820D and HP's LaserJet 3330mfp (\$699, www.hp.com). Both offer intuitive faxing, 600-dpi color scanning, sharp laser printing, and scalable copying. But in the end, we went with the 8820D because it's a bit faster, a tad cheaper,

has built-in duplexing (meaning it can automatically print to both sides of a page—a real cost-saver), and features PostScript level 3 emulation (the HP 3330 drops out at level 2).

The quickest way to cut your multifunction price tag is to forgo laser printing in favor of an inkjet option. In this category we liked HP's officejet 7110 for its speed, 4,800-by-1,200-dpi photo-printing capabilities, high-quality 1200-dpi scanner, and network potential (HP makes a wireless Jetdirect print server for it). If you want another



OUR CHOICE: SYSTEM

- Apple 1.8GHz Power Mac G5 (\$2,399, www.apple.com) with
 - 20-inch Cinema Display (\$1,299) and
 - 12-inch Combo Drive PowerBook with AirPort Extreme card (\$1,698)
- Total Price: \$5,396

LESS EXPENSIVE

- Apple 17-inch iMac (\$1,799) or
 - 12-inch Combo Drive PowerBook (\$1,599) with
 - 17-inch Sharp LL-T17D3 flat-panel display (\$499, www.sharpsystems.com)
- Total Price: \$1,799 or \$2,098

MORE EXPENSIVE

- Apple Dual 2GHz Power Mac G5 (\$2,999) and
 - Two 23-inch Cinema HD Displays (\$1,999 each, plus one \$99 DVI-to-ADC adapter) and
 - 17-inch PowerBook (\$3,299)
- Total Price: \$10,395

Brother's MFC-8820D faxes! It scans! It copies! It laser-prints PostScript level 3 files on two sides of a single page! We're not sure what it would do to a tin can or a tomato, though.



OUR CHOICE: PRINTER, SCANNER, AND FAX

- Brother MFC-8820D \$649.99, www.brother.com Compatibility: Mac OS 8.6 to 9.x or 10.1 or later

LESS EXPENSIVE

- HP officejet 7110 \$399.99, www.hp.com Compatibility: Mac OS 9 or later

MORE EXPENSIVE

- Add an HP Color LaserJet 1500L \$799.99 Compatibility: Mac OS 9 or later

You should see how the new 1.8GHz G5 rips through Excel files. Toss in a 12-inch laptop for portability and a 20-inch Cinema Display, and you've got a decent foundation for getting down to business.

space. On the outside is a button that can launch Dantz's Retrospect Express backup software (bundled with the drive) and automatically back up your Mac's hard disk. This drive comes formatted for Mac and puts itself to sleep when you're not calling upon it. USB 2.0 is important if you plan on plugging the drive into a PC at any time.

Maxtor's 200GB drive has the same FireWire and USB 2.0 ports, push-button design, and Retrospect-based backup system as the 300GB drive, but costs \$100 less.

For powerhouse backup storage, a FireWire-based tape drive is ideal. It allows you to not only store

OUR CHOICE: BACKUP DRIVE

➤ **Maxtor OneTouch 300GB FireWire/USB drive**
\$399.95, www.maxtor.com
Compatibility: Mac OS 9.1 or later, 10.1.2 to 10.1.5, or 10.2.4 or later

LESS EXPENSIVE

➤ **Maxtor OneTouch 200GB FireWire/USB drive**
\$299.95
Compatibility: Mac OS 9.1 or later, 10.1.2 to 10.1.5, or 10.2.4 or later

MORE EXPENSIVE

➤ **LaCie iIT1 U&I Tape Drive**
\$849, www.lacie.com
Compatibility: Mac OS 9.1 or later



The 300GB OneTouch drives are stacked! Well, they can be, if you have two or more.

combination of print capabilities—say you don't need a fax, or maybe print speed isn't all that important to you—there's a range of options available from companies like Epson (www.epson.com) and Brother (www.brother.com).

If you have the cash, get a multifunction device *plus* HP's new Color LaserJet 1500L and bring the tantalizing technology of color laser printing into your home. It's no photo printer, but for

cranking out color reports, graphics, and presentations, the LaserJet is one fast full-color beast. One downside: It doesn't support PostScript—if you need that feature, you can jump up to the 2500L for \$100 more.

Backup Drive

Armed with both FireWire and USB 2.0, the handsome Maxtor OneTouch drive offers a whopping 300GB of storage

Share the Printer Love

What do you do if you've got two or more Macs but only one printer? Luckily, you can share almost any printer between Macs on your home network. Here are a few ways to do it.

Mac OS X Printer Sharing

Mac OS 10.2 makes sharing printers across a network as easy as file sharing. Simply hook up any OS X-compatible printer to a Mac and turn on Printer Sharing in the Sharing system preferences. Now when you go to print something from another computer on a network running OS 10.2 or later, you have the option of printing to printers connected to the first Mac, which will show up in the Network Printers submenu of your printer selection menu.

Print Server

You can also share a printer by connecting a print server to your home Ethernet network, but be sure to pick one that's right for your printer. You can share any PostScript laser printer by picking up a generic or wireless print server (\$100 or less) from a company such as D-Link Systems (www.dlink.com), Hawking Technologies (www.hawkingtech.com), Linksys (www.linksys.com), or Netgear (www.netgear.com). For sharing a non-PostScript

printer, such as an inkjet, you need a more specialized tool. Companies like HP and Epson make Mac-compatible print servers for their own printers, but they tend to be on the expensive side (\$150 to \$200). Alternately, you can buy Apple's AirPort Extreme Base Station (\$199 or \$249, depending on model), which can serve as a network print server for select USB printers (for a list of supported printers, go to www.apple.com/airport/printcompatibility.html).

backup tapes in a separate location for extra security, but also expand your holding capacity by simply buying more tapes (approximately \$70). LaCie's AIT1 unit features capacious 35GB (90GB with compression) tapes, and transfer speeds of up to a theoretical 4 MBps. The AIT1 drive comes with Dantz Retrospect Desktop software for backup (see the "Backup Software" section, p36).

Speakers

The JBL Invader sound system rocks, with four satellites and one potent subwoofer for head-smacking 4.1 surround sound. They look supercool and are perfect for putting the *home* in home office, where you can watch

that Uncle Sammy may let you write off the expense), consider Creative Labs' I-Trigue 2.1 3300 (\$99.99, www.americas.creative.com) or JBL's Creature systems (\$129.95).

If you want a chance to use your G5's new optical digital audio-out port, pick up Logitech's Z-680 5.1 surround sound, THX-certified, Dolby and DTS digital self-decoding, 500-watt, ultracool computer speaker system. It'll even turn normal stereo input into real surround sound. Now you have a home office *and* a movie theater in one. Smokin'. (Note to G4 owners: For true digital surround sound, you'll need a device like M-Audio's \$100 Sonica PCI or USB multichannel audio interface; www.m-audio.net).



Take these Invaders to your leader, and they'll rock your world in 4.1 surround.

OUR CHOICE: SPEAKERS

> JBL Invader
\$179.95, www.harman-multimedia.com

LESS EXPENSIVE

> Altec Lansing 221
\$49.95, www.alteclansing.com

MORE EXPENSIVE

> Logitech Z-680
\$399.95, www.logitech.com

DVDs or blow off an hour (or five) playing Unreal Tournament 2003. Now, since we do still want to get some work done, we went with 4.1 rather than 5.1 speakers. That's the *office* part of us talking.

The more-modest Altec Lansing 221 system won't blow the clothes off attractive members of the opposite sex, but it makes for a reasonably priced two-satellite-plus-subwoofer combo. If you can squeeze out just a little more cash (remember

Networking

The D-Link AirPlus Xtreme G may have a lame name, but it features four Ethernet ports and an 802.11g network option, and is a terrific alternative to Apple's expensive AirPort Extreme Base Station. Linksys (www.linksys.com), Netgear (www.netgear.com), and Belkin (www.belkin.com) offer similar 802.11g routers. We picked the AirPlus Xtreme for its slightly lower price and because D-Link officially welcomes Mac users (Linksys doesn't). In general, though, a router is a router—if you find a good deal, go for it. If you already have a PostScript laser printer, opt for a router that has a built-in print server so you can

Gee, this D-Link G router is terrific.



print from anywhere on your network (see "Share the Printer Love," p33).

You can save a few bucks and opt for the older, slower AirPort standard. Netgear's MR814 is reasonably priced and offers official Mac support, but 802.11b routers are continuing to drop in price, so keep your Web browser peeled for good deals. Some might suggest buying a plain old wired router for \$50 or less. To them we say: Get out of here, cord-boys and -girls!

For a deluxe wireless setup, pick up Apple's homegrown AirPort Extreme Base Station. The antenna port lets you increase AirPort's range, and you can use its modem port to call home from remote locations as well as access your broadband Internet connection and any active computer on the network. The Base Station also features printer sharing, although Mac OS 10.2.3 or later is required (see "Share the Printer Love," p33).

Personal Digital Assistant

Phone numbers, addresses, appointments, and to-do lists. Sigh. All work and no play makes for grumpy homebodies. That's why we opted for the digital camera-wielding, MP3-blasting, video-playing, color graphics-spitting Palm Zire 71. Light, colorful, and easy to use, it'll impress the hell out of your cat.

If you're scrounging for change in the sofa, consider getting a Palm Zire—a full-fledged Palm PDA for only 99 bucks. Expandability is out, color screen is naught, but the Zire is small, lightweight, and surprisingly elegant.

OUR CHOICE: NETWORKING

> D-Link Systems
AirPlus Xtreme G 802.11g Wireless Router
\$109, www.dlink.com
Compatibility: High-speed Internet connection, Mac equipped with AirPort or AirPort Extreme

LESS EXPENSIVE

> Netgear MR814
802.11b Cable/DSL Wireless Router
\$79.99, www.netgear.com
Compatibility: High-speed Internet connection, AirPort-equipped Mac

MORE EXPENSIVE

> Apple AirPort Extreme Base Station (with modem and antenna port)
\$249
Compatibility: Mac OS 10.1.5 or later for Base Station configuration

Is the Zire still too expensive for you? Better head down to the local stationery store and stock up on Post-it Notes.

For top-of-the-line organizational assistance, check out the beefy Palm Tungsten C, with built-in Wi-Fi (802.11b), 64MB of RAM, a sharp 320 by 320 screen, a keyboard, and a massive 400MHz processor. Of course, you could always wait a while for the promising, itty-bitty Handspring Treo 600 (price TBA, www.handspring.com)—the MiniMe of full-featured PDAs, combining a Palm, cell phone, digital camera, and Web browser in one little body.



You can get work done without the Zire 71's hidden camera, color graphics, and MP3s, but we don't recommend it.

OUR CHOICE: PERSONAL DIGITAL ASSISTANT

► **Palm Zire 71**
\$299, www.palm.com
Compatibility: Mac OS 9.1 or later, or 10.1.2 or later

LESS EXPENSIVE
► **Palm Zire**
\$99
Compatibility: Mac OS 9.1 or later, or 10.1.2 or later

MORE EXPENSIVE
► **Palm Tungsten C**
\$499
Compatibility: Mac OS 10.1.2 or later

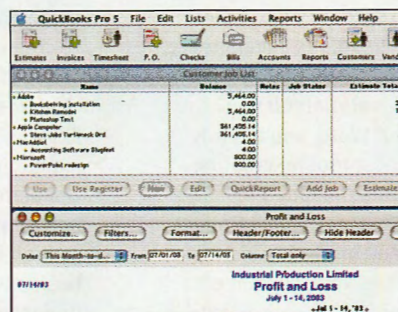
The Ultimate Software

Accounting

In our "Mac Product Slugfest" (Oct/03, p18), QuickBooks Pro 5 won out over MYOB AccountEdge, mostly because of its more intuitive interface. QuickBooks Pro makes the job of bookkeeping less painful by helping you track invoices, sales, income, and expenses. You can also use it to track how much time you work on a project or to manage payroll, should you have minions. Hey, we want minions.

MYOB's FirstEdge is aimed at the solo business entrepreneur with slim financial resources. As with QuickBooks Pro and AccountEdge, you can use FirstEdge to manage business bank accounts; keep track of customers, invoices, and jobs; monitor sales; and create reports for your accountant. FirstEdge doesn't include AccountEdge's time billing, inventory management, and payroll options.

Even with an accounting application, you are going to need a part-time accountant if your business (and bank



Manage clients and contacts, keep track of bills, and generate financial statements with QuickBooks Pro.

account) is doing well.

Why not bring one on full time? Then you can get back to doing what you do best, whatever that may be.

Spreadsheet/Text

Microsoft's Office suite is still an indispensable tool for the home office. Word and Excel are not only ubiquitous, but also the most powerful and full-featured word processor and spreadsheet programs currently available. The suite also includes PowerPoint for creating presentations,

OUR CHOICE: ACCOUNTING

► **QuickBooks Pro 5**
for Mac
\$299.95, www.quickbooks.intuit.com
Compatibility: Mac OS 9.2.2 or later, or 10.1.5 or later

LESS EXPENSIVE

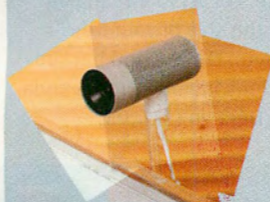
► **MYOB FirstEdge**
\$99, www.myob.com
Compatibility: Mac OS 8.6 to 9.x or 10.1 or later

MORE EXPENSIVE

► Hire a full-time accountant
\$100 per hour and up

Useful Additions

Bits and bobs to help you optimize your productivity.



APPLE ISIGHT

\$149, www.apple.com
Compatibility: Mac OS 10.2.5 or later

Working at home can get lonely, so get an iSight cam and iChat AV, and convince your friends and colleagues to get one too (being the only person with an iSight is about as fun as talking to yourself on the phone). You can communicate more effectively, and your boss won't forget what you look like.



DYMO LABELWRITER 330 TURBO

\$199 (street), www.dymo.com
Compatibility: Mac OS 8.6 to 9.x or 10.1.5 or later

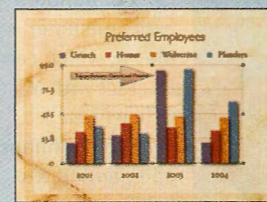
For your label and package printing needs, Dymo offers a range of label-specific printers. The 330 Turbo is the top of the line, able to spit out a label every two seconds. You can also use it to customize labels and print bar codes.



SMARTDISK POWERPLAY PRO

\$69.99, www.smartdisk.com
Compatibility: Mac OS 8.6 to 9.x or 10.1.5 or later

Glide between presentation slides from as far away as 33 feet. SmartDisk's PowerPlay Pro remote includes a thin handheld control unit with a built-in laser pointer, plus a USB receiver plug with 32MB of Flash memory. So get up, walk around, gesture wildly, and blind people when they ask questions you can't answer.



APPLE KEYNOTE

\$99, www.apple.com
Compatibility: Mac OS 10.2 or later

Sick of PowerPoint? Check out Keynote. Designed for Steve Jobs himself, Keynote offers powerful graphics capabilities, elegant chart-making tools, and intuitive controls.

A Word for Business Stationery

What business would be complete without letterhead, fax coversheets, business cards, and other personalized materials? If you have Microsoft Word, you already possess the best tool for creating such documents. Included in Microsoft's Business Forms Project Gallery (located in the File menu) are templates for fax coversheets, letterhead, and invoices. You can either use them as they are or

customize them to suit your taste. To create a personalized template, change fonts, add graphics, or otherwise tweak the design to your liking, select Save As from the File menu, then Format > Document Template. Your new template will now show up in the My Templates section of the Project Gallery. To make business cards, choose Label from the Project Gallery, and adjust the settings to match your business-card stock.



Word offers several forms of fancy templates for fax covers, letterhead, and invoices. We recommend customizing them a bit.

as well as Entourage—a solid email client, personal information manager, and calendar rolled into one. Office is the de facto standard, and sometimes you've got to roll with the masses.

A good inexpensive alternative is ThinkFree Office, which features standard word processing and basic page-layout functions, competent spreadsheet functionality, and a decent presentation program. It can also read and save docs as Word or Excel files—though one

noticeable absence is Word's white-you-type spelling and grammar check. Another alternative is Apple's AppleWorks (\$79 or bundled with consumer Macs), which can also interact with Microsoft Office files.

If you're financially able, add IBM's voice-recognition software, so you can lean back and dictate text as if your Mac were your own private secretary. ViaVoice lets you chatter into any text

field and even control your Web browser with your choice of dorky voice commands: "Safari, to The Onion. Make it so." The financially challenged can opt for the \$59.99 Simply Dictation for Mac OS X, which lets you dictate only into IBM's SpeakPad software.

Backup Software

We already have Dantz Retrospect backup software in our ultimate setup



Use Backup, and when you're paddling to dry land after a flood consumes your office, at least you'll know your files are safe.

(see "Backup Drive," p33), but because we're intensely paranoid (just why are you reading this article, anyway?), we chose to get a .Mac account. With .Mac's included Backup, we can copy our most important files to our remote iDisk—a secure off-site location safe from fire, natural disasters, and thieves. A 100MB iDisk isn't much, but it's sufficient to store those few documents you just can't lose. For \$350 a year, you can increase the size of your iDisk up to a gigabyte. Other good backup software options include Propaganda Production's Déjà vu (\$14.95,

OUR CHOICE: BACKUP SOFTWARE

➤ **Apple Backup**
\$99 per year, www.mac.com
Compatibility: .Mac account, Mac OS X (10.2 or later for Backup 2.0 or later, 10.1.5 or later for Backup 1.0)

LESS EXPENSIVE

➤ **LaCie SilverKeeper**
free, www.silverkeeper.com
Compatibility: Mac OS 9.0.4 or later or 10.1.2 or later

MORE EXPENSIVE

➤ **Dantz Retrospect Desktop Backup**
\$129
Compatibility: Mac OS 9 or 10.1.2 or later

OUR CHOICE: SPREADSHEET

➤ **Microsoft Office v. X** for Mac Standard Edition or Office 2001
\$399 for v. X, \$360 for 2001 (street), www.microsoft.com/mac
Compatibility: Mac OS 8.1 or later for Office 2001, or 10.1 or later for Office v. X

LESS EXPENSIVE

➤ **ThinkFree Office**
\$49.95, www.thinkfree.com
Compatibility: Mac OS 8.6 to 9.x or 10.1.3 or later

MORE EXPENSIVE

➤ **Add IBM ViaVoice Mac OS X Edition**
\$124.99, www-3.ibm.com/software/speech
Compatibility: Mac OS X or later (Mac OS 9 version available)

Create Some Atmosphere

For advice on arranging our perfect home office, we turned to Neal Zimmerman, architect and author of *At Work at Home* and *Home Office Design*—and a dedicated Mac user who has designed, customized, and surveyed hundreds of home offices. Here are a few of the tips he shared with us—for more ideas, check out his books, available at www.atworkathome.com.



GET EVERYTHING OFF THE FLOOR.

Zimmerman says most people don't realize how cluttered their space is until they try to clean it. By picking up, you'll gain some floor space and force yourself to find a place for every piece of paper and loose CD-ROM.



GET A GOOD CHAIR

The place to save money isn't where you plant your butt for hours at a time. Look for a chair that's adjustable, comfortable, and designed to keep you squarely facing your desk.


www.propagandaproduct.com) and Qdea's Synchronize X Plus (\$29.95, www.qdea.com).

The handy backup utility SilverKeeper, which LaCie offers as freeware, works with any disk you can mount on your desktop. SilverKeeper keeps exact copies of assigned folders on a remote hard drive and will restore that folder should something go awry. In the latest version, you can even automatically schedule backups in Mac OS 10.2 or later.

For first-rate backup, we recommend Retrospect Desktop Backup. Desktop is essentially the same as Express but includes a few key extras, such as support for up to three machines (Express is limited to one). Retrospect Desktop will even seek out your laptop on your home network and automatically copy files to a hard drive connected to your desktop Mac. Heck; it'll even back up a Windows machine on your network.

The Damage

Our dream setup totaled a mere \$7,831.84 (not counting additional items). The cheapest cheapskates out there slid in for \$2,876.83, and you big spenders invested an impressive \$14,494.92 (not including your personal accountant—and extras such as a private jet or golf course). Now it's time to start earning that money back...

 Home-based freelance writer and editor Robert Capps, like the band Loverboy, is working for the weekend.

Accessories Make the Office

Consider adding some panache to your office with one of these extras.



VENGEANCE ENABLER

Slingshot with Sights

\$24.99, www.coolgadget.net

Neighbor's kid keep screaming? Can't concentrate? A water balloon to the back might not shut him up, but it'll sure be fun to watch.



ATMOSPHERE ENHANCER

Desktop Air Conditioner

\$24.99, www.igadget.com

Keep nasty sweat stains to a minimum—you never know when that sexy FedEx delivery person is going to ring your doorbell.



ENERGY BOOSTER

Portable Mini Fridge

\$54.99, www.thinkgeek.com

Load this baby up with Red Bull to wash down your Caffeine Candy Sampler, and you're ready to roll—or have a heart attack.



STRESS BUSTER

Executive Punch Bag

\$24.95, www.igadget.com

Get in shape (sort of) while getting out your aggression. Be sure to ask: "You talkin' to me?" a few times before throwing the first blow. Perhaps even point out that you don't see anyone else around, so it must in fact be talking to you.



WORK-AT-HOME VALIDATOR

Office Space DVD

\$14.99, www.amazon.com

Watch, and laugh at those poor suckers trapped in cubicle hell. Who's got a case of the Monday blues now, buddy?!



ATTITUDE IMPROVER

750ml Ketel One Vodka

\$19.99, www.bevmo.com

Cuz at home, there's no one to accuse you of having "a problem." Oh, please, we're kidding—we're single-malt Scotch drinkers.



PERSONALIZE YOUR SPACE

Make your home office a place where you feel comfortable. Don't, as Zimmerman says, make it a place you go to suffer through work. The key is to personalize your space: If you like plants, put some in your office. If you like oversize schematics of the Enterprise-D...well, you get the idea.



PREVENT GLARE

Position your display so it neither faces a window nor has a window directly behind it. It's tempting to want to look outside as you work, but glare or excessive contrast from bright lighting can cause eyestrain.



REDUCE OVERHEAD LIGHTING

This helps reduce eyestrain. Instead, use what Zimmerman calls *task lighting*—individual light sources that suit specific tasks (reading, drafting, and so on). Furthermore, these task lights should illuminate their specific areas from below eye level.



LOOK DOWN ON YOUR MONITOR

To reduce neck strain, position your monitor so that you are looking down at the center of it by roughly 10 degrees. Ideally, Zimmerman says, your eyes should be even with the top third of your screen. If necessary, change the height of your chair or attach an adjustable monitor stand.

One man. One Power G4.

An animated masterpiece created single-handedly by Japanese animation prodigy Makoto Shinkai.

「Voices of a Distant Star」 ほしのこえ

"...a pioneering effort...an undistilled product of the voice and vision of its creator. Highly recommended."

-DigitallyObsessed.com

"...perhaps the most intensely personal film I've ever seen... It's marvelous to behold."

-AnimeJump.com

"...emotionally honest, brilliantly conceived, absolutely touching and thrilling to behold."

-Shotgun Reviews

"A quiet, understated lovestory..."

-Sci Fi Magazine

"Voices is of a rare anime archetype that bridges the gap between Eastern and Western influences, speaking directly to the heart."

-Play Magazine

Available on DVD for \$19⁹⁸ SRP wherever videos are sold,
or get yours today at www.advfilms.com/voices!



www.advfilms.com

Like a prodigal son, a legendary Mac game returns from the Xbox wilderness... with bells on.



Halo's Here



Halo

Publisher: MacSoft

Contact: 866-512-9111, www.macsoftgames.com

Release Date: October/November 2003

Price: \$49.99

by Frank O'Connor

(at Last)

When it was first shown to the world in 1999, Halo was a Macintosh game. Steve Jobs himself did the honors, presenting Bungie's magnum opus at Macworld New York to a mixture of awed astonishment and palpable glee. A Macintosh killer gaming app!

Or not. Microsoft acquired Bungie (of Marathon and Myth fame) and turned Halo into an Xbox exclusive, simultaneously wowing the gaming world and disappointing Mac owners.

But patience has prevailed. That period of Xbox exclusivity is over. Halo has returned (after selling three million units on Microsoft's Xbox console), and the Mac version is the best yet. This first-person shooter pushes the limits of the genre and shows off exactly what your new G5 (or high-end G4) can do.

You may as well kiss your life good-bye.

Manning an abandoned Covenant turret, Master Chief gives a Banshee pilot a taste of his own medicine. And isn't the beach pretty?



In an unlikely-yet-possible scenario, a machine gun proves a match for the mighty Scorpion tank.

Detail is everything: The readout "21" on this machine gun indicates the number of bullets you have left, and gives you a heads up on when to reload.



A Scorpion tank inside a tunnel demonstrates how huge the environments are.

Halo: The Story

If you don't live and breathe games, there's a pretty good chance you don't know exactly what Halo is about. Let's start with the story. In the 24th century, humanity faces an onslaught from a mysterious warlike race known as the Covenant. During one particularly apocalyptic conflict, the humans stumble on a vast artifact, a ring-shaped artificial world they call Halo. What's even more disturbing than finding it is discovering that neither humans nor the Covenant had anything to do with its construction.

After crash-landing on this world, human forces continue battling the advancing Covenant horde, while a lone soldier—a genetically enhanced Spartan—battles to the heart of the mystery of Halo to save his companions and the planet Earth itself.

A Spartan is a near seven-foot-tall elite supersoldier. The special forces of the future, Spartans wear powerful armor called Mjolnir, are incredible marksmen, and can soak up and dish out punishment with equal tenacity. You play Master Chief (he doesn't have a name, he just goes by his rank), who is the last Spartan left alive and the only hope for saving the dwindling human forces from extinction.

Halo: The Gameplay

The single-player mode (called Campaign) is intense, complex, and brilliantly paced—with the possible exception of a confusing, tough level called The Library. You'll find yourself fighting either alongside surprisingly smart AI-controlled teammates or alone against overwhelming forces. There's also a multitude of dramatic and exciting levels, such as a nighttime sniper mission and a sun-bleached beach assault that's so pretty you might get killed while gaping at the scenery.

The scenery in Halo is something to see. Sharp, detailed graphics portray endless vistas thick with trees, rivers, and mountains, or labyrinthine alien structures that really show off the latest graphics-card capabilities like antialiasing and bump mapping (the appearance of dimples and textures on surfaces). The soundtrack is no slouch either, with a pounding orchestral score, excellent voice acting, and thundering sound effects. The overall effect is truly cinematic.

Our hero, Master Chief, is an able athlete. He can run nonstop for limitless distances (useful considering the game's huge environments), leap seven feet in the air, and crush even the mightiest opponent with a swipe

From now on, you live on Halo.

of whatever gun he's holding at the time—this proves handy when you run out of ammo.

Sure, all of this muscle sounds like standard first-person shooter fare, but Halo ups the ante with its inclusion of fully useable vehicles such as Warthogs, Scorpion tanks, Covenant speed bikes called Ghosts, and even a flying alien craft called a Banshee. These vehicles allow you to travel through the vast landscape in myriad ways and, combined with incredibly detailed and realistic physics, make Halo one of the most involving shooters you'll ever play.

Halo: The Multiplayer Experience

In multiplayer modes, either on a LAN or via the Internet, you may as well kiss your life goodbye. From now on, you live on Halo.

You can join or create several types of games, including a simple deathmatch and a complex vehicle-filled capture-the-flag game. You have unprecedented control over the rules and items available in each game. Carefully tailoring parameters, such as the respawn time for felled opponents or the number of available

rocket launchers, can drastically change the pace of play.

Since many vehicles can accommodate multiple players, teamwork is essential. The Warthog jeep, for example, comes with either a turret-mounted machine gun or rocket launcher (not available in the Xbox version)—one buddy can man that weapon while you drive and another friend literally rides shotgun.

Halo: The Bottom Line

We know: Mac addicts have been burned before when it comes to Halo. But Peter Tamte, MacSoft's founder, assures us that the Mac version is right on track. "Our biggest two challenges now are getting our Mac games out simultaneously with the PC games and letting Mac and PC players play against each other online."

Combining an endlessly addictive multiplayer experience with a startlingly accomplished and cinematic single-player adventure ensures legendary status for a game that already enjoys mythical proportions. Make space on your hard drive and clear some time on your calendar—you're going to get hooked.



In a typical vehicle fight, a hovering Ghost (bottom) takes on a Warthog (top). Both players are free to leap from their speeding craft at any time and continue the battle on foot.



One of the weapons new to the Mac (and PC) version of Halo is the fuel rod gun. It fires an arcing bolt of explosive death across this (also exclusive) new multiplayer map.

GET A LEG UP

Gameplay Tips for Destroying the Enemy

PISTOL WHIPPED

The humble pistol is not to be sneezed at. Carefully aimed at a player's head, it can take down opponents quickly and accurately. Practice shooting the little bit of helmet that pokes out of a tank's cockpit, and you'll find that in pistol versus tank, the pistol wins every time.

FREE GRENADES


Both types of grenade, regular and sticky plasma, are devastating. Be careful not to throw one while you're reloading a weapon like the rocket launcher. The reloading process will stop entirely while you throw, and the wait could prove a deadly delay.

MELEE MADNESS

All weapons are fair game in melee combat, and a swipe from above or behind can often kill an opponent outright. A combination of machine-gun fire and melee combat can prove effective at close quarters.

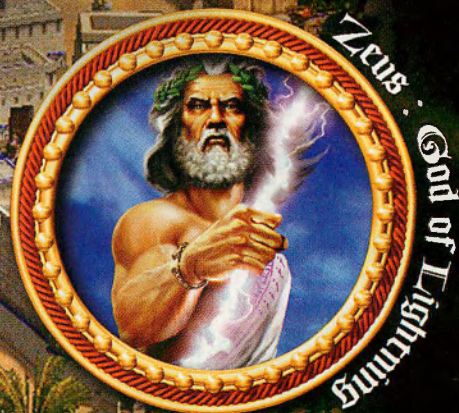
SHIELD SHENANIGANS

In multiplayer modes, your opponents have a shield charge that protects them from percussive rounds. You can deplete that charge with Covenant weapons like the charging plasma pistol. Try blasting a bad guy on a Ghost with a charged shot. His shields will fall, and you can quickly switch to human pistols to finish him off.

 Frank O'Connor is the executive editor of *Official Xbox Magazine* and a *MacAddict* contributing editor. He's logged at least 500 hours of Halo on Xbox and plans to play 500 more when the Mac version comes out. If his wife lets him.

AGE of MYTHOLOGY[®]

From the creators of *Age of Empires*[®]
and *The Age of Kings*[®]



Coming for Macintosh Fall 2003

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Unleash the wrath of the gods

Enter a world where legends are real and the will of the gods decides the fate of mortal man. Build majestic temples, farm the fertile valleys, and seek out wealth in distant realms. Join brave heroes in the greatest battles of mythology, from the walls of Troy to the gates of the Underworld. Summon mighty minotaurs to smash enemy citadels, or call down fire from the skies. The choice is yours.

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Violence
Blood

MacSoft

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impressed.



You'll be
satisfied.



You'll be
disappointed.



You'll be
pissed off.

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We love our work, especially when road testing the new Power Mac G5 counts as work. By road testing we mean playing *Spy Hunter*, projected on the wall via Epson's PowerLite S1 multimedia projector (shown here). Jealous? Work this month also entailed rocking *AmpliTube Live*—guitar amp emulating software that's even cooler than we'd hoped. Lest you think it's all G5s and groovy gear around here, we also blew a week troubleshooting two feeble wireless gadgets, and paid the piper with an overpriced data-backup solution. Coming soon: versatile audio-synth and -sampler software, the world's first 8-color inkjet printer, and Tony Hawk's Pro Skater 4.

ThisMonth:

- 44 1.8GHz Power Mac G5 G5 tower
- 60 80.0GB ABSPius Desktop-Mac backup drive and software
- 50 Acrobat Professional 6 PDF-processing software
- 58 Air DWL-122 USB Adapter wireless network adapter
- 46 AmpliTube Live guitar amp emulator
- 52 Anarchy Toolbox After Effects plug-ins
- 56 Contribute 2 Web updating software
- 59 Card Photo Printer CP-300 mini dye-sublimation printer
- 55 Dfine 1.0 Photoshop plug-in
- 60 JumpDrive Secure secure flash drive
- 51 Mailsmith 2.0.1 email client
- 61 MacSkate attachable Power Mac wheels
- 48 Mystical Tint Tone and Color Photoshop plug-ins
- 61 NaviPod 3G wireless iPod remote
- 56 Photo-Objects stock photography
- 59 Podzilla gear bag
- 47 PowerLite S1 multimedia projector
- 53 Runtime Revolution 2.1 application-development environment
- 49 Spy Hunter action racing game
- 54 WarCraft III: The Frozen Throne real-time war strategy/role-playing game
- 58 WiFi Finder wireless-network detector
- 60 Zip-Linq retractable cables

PLUS:

TheHotList

62 The best of the best from recent reviews.

X Compatible with
Mac OS X or later.

9 Compatible with
Mac OS 9 or earlier.



If we were
shopping for this
type of product,
this is the one
we'd buy.



1.8GHz Power Mac G5

G5 TOWER

As of press time, Apple hadn't yet provided us with a Dual 2GHz Power Mac G5 for testing—but we were so impatient to experience the G5's power, we went out and bought a 1.8GHz model.

We weren't disappointed.

After taking apart this boxy behemoth and putting it back together, running a series of tests on it using the only popular optimized-for-G5 software available (Photoshop 7.0.1 with Adobe's free G5 Processor Plug-in), and throwing some nonoptimized software at it, we can confidently proclaim that the 1.8GHz Power Mac G5 is the fastest single-processor Mac Apple has ever produced.

From the moment we hefted this 39-pounder out of its shipping box and placed it next to a Dual 1.42GHz Power Mac G4, we knew that the future had arrived in a big—and we do mean *big*—way. Although the 20.1-inch-tall G5 is only about 3 inches taller than its predecessor, its straight-line solidity makes it appear to tower over the curvy G4.

Much of the G5's altitudinousness can be credited to its independent-compartment thermal zones: one each for its power supply, processor, expansion cards, and media. Each compartment is equipped with its own fan or fans, and each uses one of a variety of thermal-sensing methods to adjust fan speed. This herd of well-



Suddenly the Power Mac G4 looks positively puny.

controlled fans, coupled with mesh front and back panels, enable cool air to waft gently over the G5's toasty innards—ever so quietly. Stinging from the howling debacle of the original Mirrored Drive Door (aka Wind Tunnel) Power Macs, Apple promised the G5 would be an exceptionally quiet machine. They have delivered on that promise.

Helping to keep the G5 cool is a new

In tests using G5-optimized software, this single-processor Power Mac G5 consistently whipped a top-of-the-line dual-processor Power Mac G4

technology called *processor and bus slewing*, in which the processor runs only as fast—and, thus, as hot—as is needed. If you're running complex Photoshop filters or rendering transitions in Final Cut Pro 4, every ounce of the G5's horsepower is working for you. If, however, you are in Word, pausing to think of a synonym for *height*, the G5 will take a wee nap. The 1.8GHz G5 processor can transition from between 1.3GHz and 1.8GHz, with its frontside bus running at half the speed of the processor. What's more, the processor's default state is completely idle—even cooler, in more ways than one. But don't worry, it's ready to roar whenever you need it: The G5 can achieve full speed in a few nanoseconds.

To we dedicated pokers-under-the-hood, however, the coolest thing about the G5 case

is not how coolly it runs, but rather how thoughtfully engineered it is. Popping both optical and hard drives in and out was a snap, and didn't require the use of a single tool—if you've ever swapped out an optical drive in a Mirrored Drive Door G4, you know what a blessing this new arrangement is. Memory is equally easy to add and subtract—just remember to add the 184-pin DIMMs in matched

ELEGANT ENGINEERING

As with all other maintenance chores in the new G5 case, removing the boot drive is a snap.

1 First unhitch the power and SATA-150 cables from the boot drive (in the top bay) and flip down the locking tab, labeled A.



2 Then slide the drive forward, downward, and out through semicircular plastic slots—it's guided by two round-headed Phillips screws on each side of the drive case.



3 Apple provides four more round-headed Phillips screws, ready for when you want to install an additional drive in the bottom bay, labeled B.



pairs. PCI and PCI-X cards pop in and out easily too, whether they're big ol' 12.335 inchers such as Pro Tools HD Core and HD Process cards, or more-standard 6.926-inch cards. Use the top PCI-X slot (labeled number 4) for bandwidth-hungry cards, as it clocks in at a hefty 133MHz; the number 3 and 2 slots are rated at 100MHz—not too shabby, considering the PCI slots in the fastest Power Mac G4 are limited to 33MHz.

The 1.8GHz Power Mac G5's boot drive is a cool-running 160GB Seagate Barracuda 7200.7. Both drive bays are on their own individual SATA-150 bus (Serial ATA, 150 MBps), which helped our boot drive handily beat the Power Mac G4 in tests involving opening and saving large files. The SuperDrive in our test unit is a Sony DW-U10A, which supports CD audio, CD-ROM, CD-R, CD-RW, DVD+RW, DVD+R, DVD-RW, and DVD-R (no word yet on when software will appear to support this potent hardware), and enjoys an ATA/100 bus; the Power Mac G4's SuperDrive languishes on an ATA/33 bus. Despite the new bus, however, the SuperDrive remains slower than the optional Combo



Put your most bandwidth-hungry PCI-X card in slot number 4—it's rated at 133MHz.

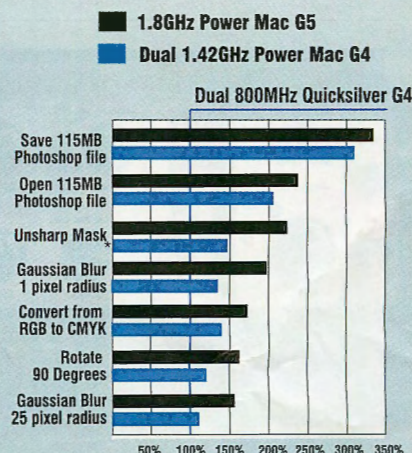
drive when burning CD-Rs: 16X vs. 32X.

And speaking of slow, the one task our old Dual 1.42GHz Power Mac G4 performed faster than the new G5 was encoding a DV file to MPEG-2 in QuickTime Pro. With the G4 running Mac OS 10.2.6 and the G5 running 10.2.7 (the G4 can't run 10.2.7—the newer OS is G5-only), and both running QuickTime 6.3, the G4 encoded our 2GB test DV file in just under 5.5 minutes; the G5

THE WINNER AND NEW CHAMPION...

For our testing, we chose Photoshop 7.0.1 with Adobe's G5 Processor Plug-in installed because at press time Photoshop was the only widely popular app optimized for the G5. In addition to running our battery of tests on the new 1.8GHz Power Mac G5 and the former top-of-the-line Dual 1.42GHz Power Mac G4, we ran them on a machine you're more likely to have at your own desk: a Dual 800MHz Quicksilver Power Mac G4. We then compared the G5 and high-end G4 to the Quicksilver.

The Dual 1.42GHz Power Mac G4 and Dual 800MHz Quicksilver Power Mac G4 were running Mac OS 10.2.6. The 1.8GHz Power Mac G5 was running Mac OS 10.2.7. All three had 512MB of memory.



All performance relative to that of Dual 800MHz Quicksilver Power Mac G4. Longer bars are better. *Amount of 200 percent, radius of 5 pixels, threshold of 0 levels.

required more than 6.5. Apparently QuickTime either takes great advantage of dual processing, or QuickTime 6.3 is not yet G5-optimized. Probably both.

However, when we ran tests in G5-optimized Photoshop 7.0.1 (see "The Winner and New Champion," above), the single-processor G5 regularly smoked the Dual-processor G4—but with one idiosyncrasy worth mentioning. Photoshop tasks that involve disk-drive access are notoriously variable—if you repeat the same task, you often get different performance, even if you reboot between tries. The G5 brought this variability to new heights. When we tested by performing a Gaussian Blur at a 1-pixel radius on a 115MB Photoshop file, for example, the results were all over the map: On the same test, even rebooting between tests to clear caches, the G5's best performance was 8.7 seconds, and its worst was 16.5 seconds. With more RAM, performance would be less variable—and a lot faster.

No matter. In the time-honored tradition of product testers everywhere, we ran each test an inordinate amount of times—in some cases, more than twenty—then threw out the highest and

lowest scores, and averaged the rest to get our results. Any way we cut it, the G5 consistently outperformed the G4.

Despite our admiration for this big box, however, we do have our quibbles: It can't run Mac OS 10.2.6 Server; it won't accept our old 5V PCI cards (only 3.3V cards will do); there's nowhere to plug in our Apple Pro Speakers (and its internal speaker is the chintziest we've heard in years); it doesn't support third-party Parallel-to-Serial ATA adapters; the USB ports on the keyboard are USB 1.1—only (unlike the USB 2.0 ports on the front and back of the machine itself); and pumping it up to its full 8GB of PC3200 DDR SDRAM capacity and adding AirPort Extreme and Bluetooth cards balloons Apple's build-to-order price to a staggering \$8,373.00. Then again, that's still about \$3,600 cheaper than a top-of-the-line, RAM-crammed Mac IIx back in 1990.

However, at \$2,399 for the model we tested—that's \$300 less than the Dual 1.42GHz Power Mac G4 went for—the 1.8GHz Power Mac G5 is a bargain. Now it's even harder to wait for the Dual 2GHz G5 to arrive. Aren't you glad you already live in the future?—Rik Myslewski



COMPANY: Apple
CONTACT: 800-795-1000 or 408-996-1010, www.apple.com
PRICE: \$2,399

SPECIFICATIONS: 1.8GHz PowerPC G5 processor, 512K L2 cache, 512MB DDR SDRAM, 160GB SATA hard drive, SuperDrive, 64MB nVidia GeForce FX 5200 Ultra

GOOD NEWS: Fastest single-processor Mac ever. Exceptionally quiet. Easy, no-tools maintenance.
BAD NEWS: Big. Fewer optical-drive and hard-drive bays than the Mirrored Drive Door Power Mac G4.

MacAddict RATED
AWESOME

PHOTOGRAPHY BY MARK MADEO

AmpliTube Live

GUITAR AMP EMULATOR



Go ahead and fire your roadies—AmpliTube Live can cram all your gear into an iBook.

Our monstrous 122-pound Marshall half-stack amp, 12-space effects rack, and 100-plus feet of patch and power cables have met their match in the form of a little iBook and this unique piece of software. Simply put, AmpliTube Live rocks. With it, we can walk onstage and crank out ballsy, AC/DC-ish riffs; vintage Hendrix-like wah-wah-ing;

squealing, it-came-from-the-80s guitar leads; and a whole lot more than our real amp ever could—



all from a guitar and iBook combo (with output to a PA system).

AmpliTube is a guitar amp emulator that features three amp models: a Vox AC-30 Top Boost for clean tone, a

Marshall JCM 800 (a sound we know well—that's our real amp) for crunch, and a Fender Solid State combo for pure unbridled grrr. Pair any of these with one of three cabinet models; add your choice of delay, wah, reverb, and overdrive effects; adjust the EQ (bass, mid, treble, and presence); and riff out to a wide range of sounds. The amp tones are amazingly realistic and warm. Words don't do this program justice; you have to hear it for yourself. And you can—just fire up the AmpliTube Live demo on this month's Disc.

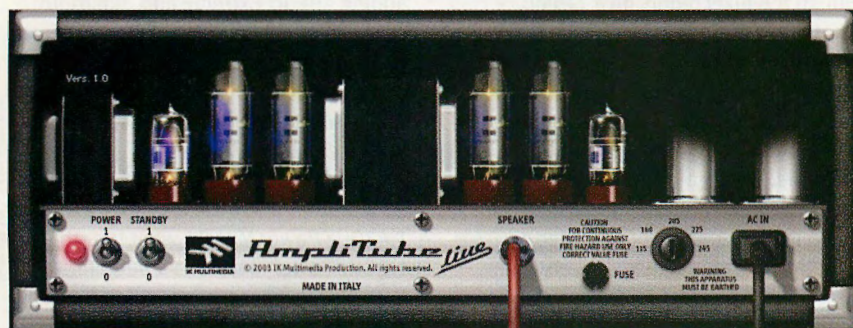
The software comes with 64 presets and space to hold 64 custom-set ones. Its interface resembles an amalgamation of different amp heads, and sports knob controls that function like their real-life

to change presets (a direct line-level input will make your guitar sound thin). After some experimenting, we replicated many of our own hard-rock guitar tones, plus created patches that had us playing everything—blues, jazz, acoustic sounds, pop, space-age noise, speed metal, and more.

The built-in tuner worked like it should—not only did it allow us to customize its standard A-440 tuning to detune our guitar down a half step, it gave us options to have the tuner always on, off, or to tune silently in Mute (amp bypass) mode. And in the spirit of rock 'n' roll vanity, AmpliTube also comes dolled up with skins to change the look of its exterior—from a cool Marshall black leather and a tough-guy metal facade to cow spots, pink fuzzies, and wood veneer (um...ick).

Our only complaint is that we wished the app had a chorus effect to liven up our clean tones. Then again, its big brother, AmpliTube Plug-In (\$399) does—and then some. While we'll miss being able to produce controlled feedback squeals when we face our guitar pickups into our amp's speaker, we won't miss schlepping 200 pounds of gear to shows in order to do so.

—Kris Fong



Check around back, where you can see that IK Multimedia takes its tubes seriously.



COMPANY: IK Multimedia
CONTACT: 39 059 28 54 96,
www.ikmultimedia.com
PRICE: \$129

REQUIREMENTS: G3, Mac OS
10.2 or later, 64MB RAM, audio input
(instrument in recommended)

GOOD NEWS: Realistic amp tone emulation and controls. Built-in chromatic tuner. Supports MIDI foot controllers.
BAD NEWS: No chorus effect. Silly icon looks like Howard Stern—and that's about it.

MacAddict RATED

AWESOME

PowerLite S1

MULTIMEDIA PROJECTOR

Multimedia projectors have traditionally been expensive, bulky devices that generate a lot of heat and noise while projecting a jumbotronic view of your Mac's desktop. By contrast, Epson's PowerLite S1 is a svelte seven-pound LCD projector that throws your Mac's video signal—or just about any standard video signal—onto your screen or wall at 1,200 lumens and from as close as three feet. The cool- and quiet-running S1 isn't exactly a best-of-breed projector—those cost far more—but it's more than competent at projecting games and DVD movies at home, or boring ol' business presentations at work.

This projector excels in versatility and portability. Transporting the S1 couldn't be easier: In addition to the unit's built-in handle, Epson includes a vinyl shoulder bag that accommodates all the cables and remotes you need. When the show's over and it's time to pack up the S1, you'll appreciate its quick cool-down time—20 seconds, compared to at least 90 seconds on most projectors.

The S1's default setting for computer use is a standard SVGA 800 by 600 resolution, but you can crank that up to 1024 by 768 and higher. At work, 800 by 600 is suitable for Keynote or PowerPoint presentations and slideshows. If your presentation includes text-heavy tables or charts, however, you'll have to choose between a slightly crowded, sharper display at the native resolution

This projector excels in versatility and portability.

or a slightly fuzzier 1024 by 768 image with more breathing room. If you create your presentations with the projector's capabilities in mind, it's easy to get great results.

On the home front, the S1 will make you very popular—at least with gamers and movie buffs. DVD movies looked

terrific projected on our wall from about 12 feet away—Epson claims a maximum range of approximately 20 feet. Playing *Unreal Tournament 2003* with near-life-size opponents is a treat. The S1's multiple video inputs mean this projector is ready to slide right into your digital lifestyle. In addition to using it connected to our Mac, we enjoyed a jumbo slideshow of snapshots from our digital camera; grainy, 12-year-old home video from a Super8 camcorder;

kitchen, bedroom, and library walls; on a sheet hung precariously across an open doorway; and even on the side of a building. A focus ring on the outside of the lens does a great job of fine-tuning the display, but sadly can't cure the distortion caused by the onboard digital zoom. Since the zoom has a meager 1:1.2 ratio, however, we'll barely miss it.

Epson provides a standard 15-pin VGA cable; you'll need an adapter to connect the S1 to any Mac with a digital-video



PHOTOGRAPH BY MARK MADEO

Epson's versatile PowerLite S1 is as at home in your boardroom as it is in your home.

the original *Shaft* on VHS; the new *Shaft* on a component DVD player; Halo on an Xbox—all by simply plugging each device into the projector, pressing the projector's Source button, and cycling through source options.

Controlling image size is simple: If you want a bigger image, move the projector farther away from the wall, and vice versa. If you need to position the projector higher or lower than the optimal, even-with-the-screen level, you can perform keystone correction up to 15 degrees using the two height-adjusting footies up front. We had no problems achieving a straight, distortion-free image in various environments: on the

port. Luckily, Apple ships those Macs with the necessary DVI-VGA adapter. Other input types include a component 15-pin D-Sub, S-Video, and three RCA jacks for composite video and audio. Additionally, you get a pair of wireless remote-control units: one for changing the projector's audio and video settings, and one for controlling your presentation onscreen using Page Up, Page Down, mute, cursor movement, or mouse clicks.

Time will tell if the bulb meets its claimed 2,000-hour life—the replacement bulb currently sells for \$199 at Epson's Web site. In the meantime, we'll keep fishing for an excuse to buy an S1.—*Niko Coucouvanis*



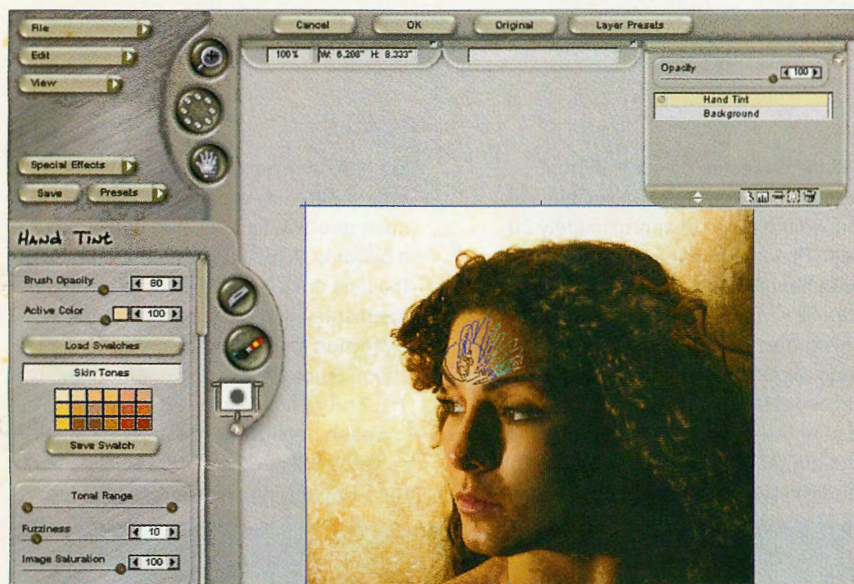
COMPANY: Epson
CONTACT: 800-463-7766,
www.epson.com
PRICE: \$999

REQUIREMENTS: Video source (VGA, Composite, Component, S-Video, or HDTV), USB-equipped Mac and Mac OS 9.1 or 10.1 or later for Presentation Remote

GOOD NEWS: Versatile and portable. Good display quality. Relatively inexpensive.

BAD NEWS: Weak speaker. We don't have an excuse to buy one.

MacAddict RATED
●●●●●●●●
GREAT



We love spot-applying effects with a brush, but this squiggly line preview isn't much help in figuring out what our rendered image will look like.

We went nuts on one image, applying 38 filters in diverse ways, and the results were stunning. The Under Color filter does more than just colorize an image—it does some of the best lost-detail cleanup we've seen anywhere,

and the general styles and options are sophisticated and well conceived. The Over Exposed filter recovered even our most poorly lit photos. Adding filters on top of filters leads to limitless possibilities; we got starry-eyed thinking about this highly evolved engine's potential.

Sadly, for all the bang-for-your-buck visual treats we admire, MTTC has some serious drawbacks. Though the brushes have nice options—opacity, size, and feather adjustments—the app doesn't offer real-size previews, so it's difficult to judge the amount of canvas you're covering. All you see is a thin line that tells you where you've painted until the app renders the effect. Trying to build up an effect evenly in an area is like mowing a huge lawn—we ended up repeatedly overlapping brush strokes to make sure we covered the whole area. Unfortunately, this made the effect look shabby.

We're also pained to report that MTTC also has the tendency to crash—a lot. Whether we used the Photoshop plug-in or standalone version, MTTC choked big time whenever we tried to use it with files larger than 15MB. After awhile, we simply gave up. We can deal with ludicrously slow render times to achieve the app's glowing results, but constant crashing is a big ol' drag.

MTTC creates an odd niche for itself: While its output is potentially stunning and the creative possibilities virtually endless, it's too slow and crash-happy for most pros and too overwhelming (and pricey) for most dabblers. More development time should have gone into making sure such a fantastic and innovative filter package wasn't marred by technical glitches and lagging brush renders.—Steve Parke

Mystical Tint Tone and Color

PHOTOSHOP PLUG-INS

When it comes to photo effects and filters, powerful tools can be dangerous weapons in the hands of amateurs. Though image-filtering technology has made digital image processing a kick, it's also killed many users' ability to think before applying. Mystical Tint Tone and Color (MTTC) aims to break that cycle with both practical and innovative filters you can use alone or as Photoshop plug-ins. We ran 'em both ways and were both impressed and depressed.

As its name suggests, MTTC touts itself as a set of tinting, toning, and coloring filters. However, it can also render effects that replicate physical lens filters, giving images anything from soft, colorized tones to hard, vibrant edges. The customizable interface is attractive and easy to navigate: Most tools and buttons are reasonably intuitive, and a quick scan through the manual will get you probing the less-obvious features. The app lets you mask

and composite images in it, and save your steps as repeatable Photoshop Actions. It also includes a staggering 700 presets to get you started, and you can apply effects globally to an entire image or brush them onto the image in layers to allow for opacity changes and masking. Plus, you can combine, edit, and remove effects at will—this is droolingly great stuff.



We recovered lost water detail in this swimming-pool shot—too bad our Mac crashed soon after.



48

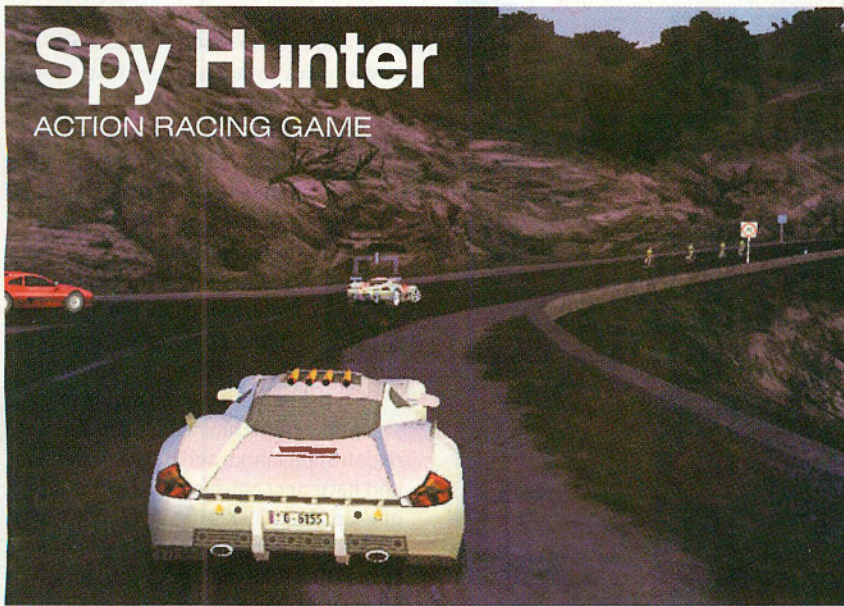
COMPANY: Auto FX Software
CONTACT: 205-980-0056, www.autofx.com
PRICE: \$179

REQUIREMENTS: Power Mac,
Mac OS 9 or later, 256MB RAM
(512MB recommended)

GOOD NEWS: Great set of filters with amazing potential.

BAD NEWS: Agonizing lag time for brush renders. No stroke-size previews. Crashes galore.

MacAddict RATED
○○○○○○
50-50



Spy Hunter

ACTION RACING GAME

Spy Hunter, huh? Hmmm. Tough wardrobe call. Wear your cloak and dagger? Or slip into a pair of isometric driving gloves?

Midway's console classic from the 1980s is back. Remember that top-down 2D action and racing game for the NES (Nintendo Entertainment System) and Commodore? Well, if it barely rings a bell, you're about to be reminded big time.

The new Spy Hunter takes a dusty old 2D superspy premise and hurtles it into the 3D present. Slip behind the wheel of a supersleek high-tech sports coupe and speed through a horde of heavily armed enemy vehicles, complete with flashy explosions, chattering machine guns, and save-the-world espionage missions.

There's even a plot—of sorts. An evil corporation, NOSTRA, is about to unleash havoc on the world, using electromagnetic pulses from four strategically placed satellites to cripple all electronics and bring ruin to civilization as we know it. Only you, the Spy Hunter, have the means to elude a flood of henchmen and stop the malicious megacorporation.

To transport you through a series of hell-for-leather mission-based races in exotic locales, you have the latest superspeedy souped-up vehicle: the G-6155 Interceptor, a slick concept car

that bristles with weapons and can morph instantly from car to speedboat when you run out of road.

It's a standard racing game, sure, but a lot tougher than NASCAR. Not only do you fight the clock, but you do it while blowing mission targets to smithereens and swerving in and out between determined enemies trying to make mincemeat out of you—but you can fight back, of course. Like the famous Bond cars, your Interceptor is loaded with gadgets. You begin with a couple of forward-mounted machine guns on your hood and rear spouts for deploying oil slicks. As you progress, you can add heat-seeking missiles, smoke screens, a powerful pulse cannon, and a tail-mounted flamethrower that can reduce your enemies to toast.

And enemies abound. You'll find yourself ducking fast all-terrain Humvees, bulletproof trucks, rocket launchers, roadsters with titanium wheel blades, amphibious mortar carriers, deadly boars, and an airborne array of helicopters, Harrier jets, and low-flying

Spy Hunter puts you in a heavily armed and armored Interceptor—here on the autobahn, you discover that it's also fast.

missile platforms. It feels a lot like driving through Texas with a sign that says "I hate Lone Star Beer."

Your Interceptor switches seamlessly from car to boat or boat to car—the morphing is beautifully done. And there's more. Take enough damage, and the car morphs into a sleek stripped-down motorcycle (or jet ski, if you're in your speedboat at the time). But don't worry too much about damage. Scattered along the courses are mobile car hospitals called Weapons Vans. Zip up the ramp into a van to restore your Interceptor to full glory and get a fresh load of ammo.

Don't get the idea that Spy Hunter is an easy ride. There may be only 14 missions, but each is stuffed with primary and secondary goals you must complete to gain points. If you miss a couple, you might as well restart the mission, since you can't move to the next mission until you gain a predetermined number of points.

One caveat: Don't bother buying this game unless you have the latest in gaming gear and up-to-date OS X software. We tried it on two fairly new machines, an eMac and an iBook, both running Mac OS 10.2, and it refused to run. The 3D graphics require some OpenGL components that didn't show up until OS 10.2.3—and didn't work well until 10.2.4.

Once you load your machine with 10.2.6, you'll get crisp graphics,

great background music (remember Henry Mancini's Peter Gunn theme?), and high-speed action. Arcade-style combat games may not appeal to everyone, but the explosive pace of this one should prove especially compelling for racing and action fans.—John Lee



The Interceptor morphs into a jet boat when you need to go the way of the gondola.



COMPANY: Aspyr
CONTACT: 512-708-8100,
www.aspyr.com
PRICE: \$29.99

REQUIREMENTS: 600MHz G3 or faster,
Mac OS 10.2.4 or later, 128MB RAM,
Radeon 7500 or GeForce 2 card with 3D
hardware acceleration

GOOD NEWS: Fast cars. Fiery explosions. Furious pace.
Good morphing animation.
BAD NEWS: Goal system forces too much replay and
repetition on some levels. Demands the latest system software.

MacAddict RATED

SOLID



Acrobat's new Loupe tool provides spot magnification—up to 6,400 percent—in a second window, so you won't get lost.

required rasterizing; the latter displays the names of all color plates in a PDF document and lets you show and hide individual plates.

Other new print-related features include the option to Output Composite, Composite Gray, Separations, and InRIP Separations; the option to print, crop, trim, bleed, and add registration marks and page information; and flattener controls. Oh, and Acrobat one-ups Mac OS X's native Print To PDF option by adding an Adobe PDF Printer to the OS X Print dialog, so you can get advanced PDFs from any app.

On the PDF-output side, Acrobat 6 introduces the PDF 1.5 file format, which promises better compression, JPEG2000 support, and support for layers when creating PDFs from layered documents.

For all of its powerful new features, Acrobat 6 has some annoyances. Most notable is the number of Windows-only features, including browser-based reviews, the ability to convert and

Version 6 is a formidable update to an already-mature technology.

print Web pages to PDF within Internet Explorer, and the ability to import and export PDF comments to and from Word documents. The app generally performed well on our Dual 1GHz G4, though screen redraw was often slow and choppy when scrolling through pages with open note windows. Finally, although spontaneous crashes aren't frequent, they're not uncommon either.

Despite these flaws, Acrobat 6 is a strong upgrade. The sheer number of new features is impressive, but even more valuable is the increased productivity they offer. Not only can you do more than ever before, but you can do everything more efficiently.

—John Cruise

Acrobat Professional 6

PDF-PROCESSING SOFTWARE

In the 10-plus years since Adobe introduced Acrobat and the portable document format (PDF), both the app and the file format have become integral parts of the publishing scene. Today, it's hard to imagine publishing—for print or the Web—without Acrobat and PDF.

Version 6 is a formidable update to an already-mature technology. Whether you use Acrobat for electronic-document markup and review, electronic-document distribution, or high-quality print output, you'll find

tools for creating, editing, distributing, preflighting, and printing PDFs; Acrobat Standard has basic tools for authoring, commenting, and tracking, but not the high-end printing and preflighting support; Acrobat Elements is further stripped down and Windows-only; and the freebie formerly known as Acrobat Reader is now Adobe Reader.

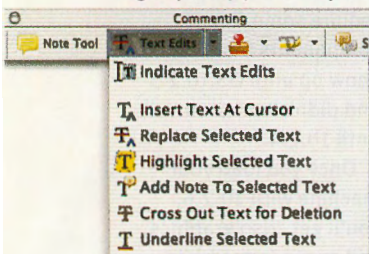
The first thing seasoned Acrobat users will notice is an overhauled interface, but don't fret: These interface changes actually make the program easier to use. For example, several important task-oriented features (Create PDF, Review & Comment, Security, Sign, and Advanced Editing) are grouped into a easy-access Tasks toolbar that consumes little screen real estate.

Acrobat's new Preflight utility lets you check a PDF document using any of several built-in preflight profiles, including the new PDF/X and custom profiles. You can also preview documents onscreen using the new Flattener Preview and Separations Preview palettes. The former lets you preview and adjust transparency effects without the previously

The new Text Edits menu lets you add notes, as well as several common editing marks, to text.

several new features in Acrobat 6 that'll make your job easier and—dare we say—more enjoyable.

First though, note the new product-family structure, from the top down. Acrobat Professional packs powerful



COMPANY: Adobe
CONTACT: 800-833-6687, www.adobe.com
PRICE: \$449, \$149 (upgrade from Acrobat 4 or later)

REQUIREMENTS: G3, Mac OS 10.2.2 or later, 64MB RAM (128MB recommended), 405MB disk space

GOOD NEWS: Many useful new features. Improved interface. Easy-to-use, context-sensitive help.
BAD NEWS: Several new features are Windows-only. Occasionally temperamental performance.

MacAddict RATED

GREAT

Mailsmith 2.0.1

EMAIL CLIENT

Not everyone needs an industrial-strength email program. Mac OS X's Mail app is free, and fine for light use, and free Web-based email is still available from the likes of Hotmail and Yahoo. For email power users, though, there's Mailsmith. Version 2 brings seamless integration with Apple's Address Book app, PGP encryption, the excellent SpamSieve junk-mail detector, and SpamCop reporting. These new integrations and a dose of new features elevate Mailsmith to a weapons-grade email manager.

Characteristically austere, Mailsmith's interface ought to comfort those tired of cutesy widgets and globular icons. Mailsmith is close kin to the king of text editors, BBEdit—in fact it uses BBEdit's engine for heavy text lifting, including magic such as PCRE (Perl-compatible regular expressions) searches and massive filtering and text-transformation options, including quoted-text

For control freaks who prefer plain-text email to HTML, Mailsmith is perfect.

rewrapping for one-click cleanup of well-traveled messages. Plus it's fully AppleScriptable, so a wily user can do the aforementioned heavy lifting automatically.

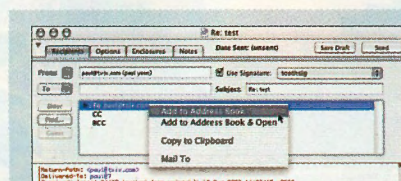
Further automation comes in the new Glossary, which allows you to insert prescribed chunks of text into your messages, including the results of scripts. Like almost every other Mailsmith function, you can assign glossary entries to keystrokes for easy invocation. Other conveniences include multiple clipboards and infinite undo, as well as a pull-down menu where you pick which account from which to send the message.



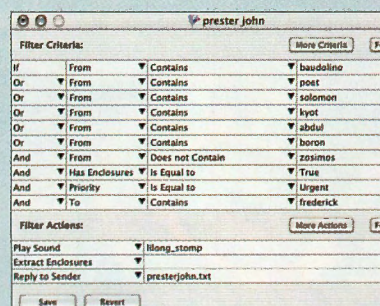
To help you avoid spam, Mailsmith works well with SpamSieve spam-

filtering software. All you do is register the included copy of SpamSieve to get one of the best—and best-integrated—antispam weapons available. Since SpamSieve's filtering scheme learns as you go (like Apple's Mail app), it keeps crap detection unique to your preferences—if you want to do business with Nigerian royalty disposing of hidden fortunes, for example, you can teach SpamSieve to accept those messages.

If you're serious about avoiding



Smart integration means Address Book is always at the ready.



Mailsmith's filtering is second to none.

potentially destructive spam, you'll be happy to hear that Mailsmith still refuses to display HTML-formatted mail. Instead, it converts all HTML email into straight-up text and gives you the option of viewing the HTML version in your Web browser, where unscrupulous HTML coders can't gain access to (or wreak havoc upon) your email database.

Also seamlessly integrated and wholly welcome is PGP (Pretty Good Privacy) encryption, which jumbles your words to the point that only people with whom you've entrusted the decryption key will ever be able to decipher the message—

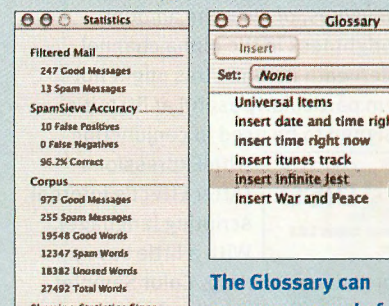
and *ever* is no exaggeration. You'll have to procure PGP yourself (www.pgp.com), and depending on your usage—personal versus professional or academic—you may have to buy a license. Once you install PGP, Mailsmith's message-composition window sprouts check boxes to encrypt and sign messages.

In a departure from many Mac mail clients, Mailsmith uses a database structure to store mail and attachments. While this enables some of Mailsmith's

Corpus - 1228 Messages

Word	Spam	Good	Total	Prob.
fedverani	0	6	6	0.010
teen	23	0	23	0.990
teenage	2	0	2	0.400
teenpeople.com	0	1	1	0.400
teens	1	0	1	0.400
teeth	0	1	1	0.400
teh	0	17	17	0.010
teiser	0	1	1	0.400
teixeira	0	1	1	0.400
tel	7	3	10	0.817

Spam eradication in action: SpamSieve examines what you've got, then breaks it down into a digestible form.



The Glossary can save you no end of keystrokes.

fancier features, it comes at the expense of searching and filtering speed, and requires an extra step if you're importing, exporting, or sharing mail between Mailsmith and another app or Mac. Apple's Mail, Eudora, Mozilla, and most other email clients use the Unix mbox mailbox format, which Mailsmith can happily import and export.

The only possible deal killer is Mailsmith's lack of IMAP support, which Bare Bones says is coming. For the rest of us POP-using control freaks who prefer plain-text email to HTML, Mailsmith is perfect.—Paul Yoon



COMPANY: Bare Bones Software
CONTACT: 781-687-0700, www.barebones.com
PRICE: \$99, \$49 (upgrade from 1.x), \$79 (for users of Entourage, Eudora Pro, or Claris Emailer)

REQUIREMENTS: G3, Mac OS 10.1.5 or later (10.2.6 or later recommended, 10.2 or later required for Apple Address Book integration)

GOOD NEWS: Incredible customization. Great scripting support. Good security tools.
BAD NEWS: Slow searches. Overkill for most needs. If you like HTML email, look elsewhere.



Anarchy Toolbox

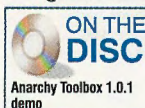
AFTER EFFECTS PLUG-INS

While most video plug-ins for After Effects and Final Cut deal with wild 'n' wacky special effects, the incredibly useful Anarchy Toolbox is less bizarre than its name implies. There are some slick, psychedelic animation possibilities lurking not too deep within this plug-in set, but for the most part, it includes some of the most utilitarian—and in some cases, essential—third-party offerings available for After Effects.

On one end of the spectrum, we find the seemingly simplistic Color Sampler. Click any pixel in your movie

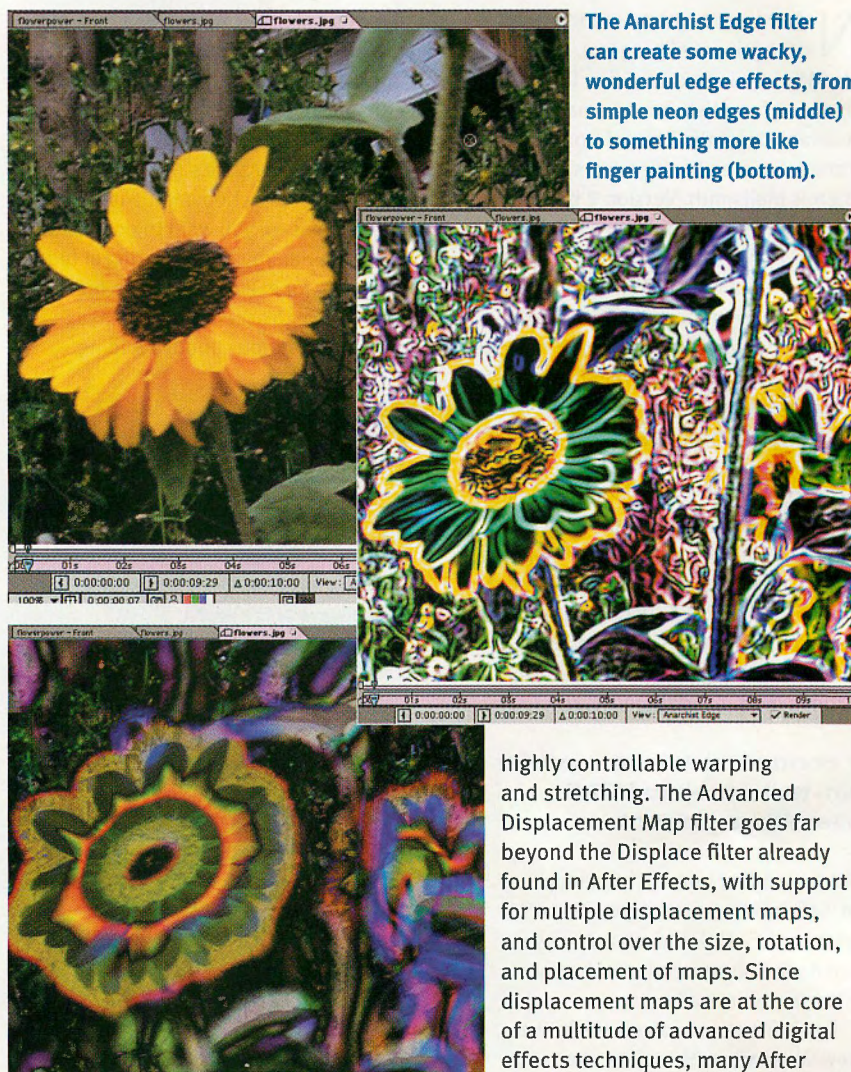
If you're serious about animation and video production, you'll want these tools at your fingertips.

composition, and Color Sampler will keep track of that pixel's numerical RGB values, or even the amount of brightness in the alpha channel underneath it. While this might not seem particularly useful at first, it's designed to be used in conjunction



with Expressions (After Effect's internal scripting language).

With a little savvy Expressions scripting, Color Sampler can automatically drive other effects based on dynamic brightness or color values. This provides a level of control advanced animators have always



The Anarchist Edge filter can create some wacky, wonderful edge effects, from simple neon edges (middle) to something more like finger painting (bottom).

wanted in After Effects.

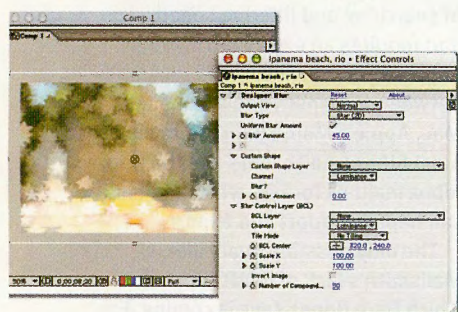
Not as subtle but equally powerful is Designer Blur, which allows you to use any 2D shape to change the look of the "blobs" of color produced by large blurring amounts. The range of visual styles you can create with Designer Blur is astounding—so much so that we're willing to bet you'll soon be seeing heavily Designer Blurred commercials and music videos.

Path Distort lets you use any path as a custom distortion envelope, delivering

highly controllable warping and stretching. The Advanced Displacement Map filter goes far beyond the Displace filter already found in After Effects, with support for multiple displacement maps, and control over the size, rotation, and placement of maps. Since displacement maps are at the core of a multitude of advanced digital effects techniques, many After Effects animators will find this plug-in alone worth the price of admission.

The Resizer introduces a deeper, more flexible set of methods for scaling images, with many more controls than you get in After Effects or Final Cut. Powerful image-tiler, noise-generator, and gradient-on-a-path filters round out the package.

All in all, if you're serious about animation and video production, you'll want these tools at your fingertips—and at this great price, you can afford the whole handful.—David Biedny



Designer Blur delivers a unique graphic look by using any 2D shape—a star, in this example—as the basis for creating an effect.



COMPANY: Digital Anarchy
CONTACT: 415-621-0991,
www.digitalanarchy.com
PRICE: \$149

REQUIREMENTS: Power Mac, Mac OS 9.0.4 or later, After Effects 5 or compatible host app (Final Cut Pro supports all but Path Distort and Gradient Path)

GOOD NEWS: Great balance of usefulness and style. Cool new distortion tools. Designer Blur!
BAD NEWS: Gradient Path and Path Distort don't work in Final Cut.

MacAddict RATED
GREAT

Runtime Revolution 2.1

APPLICATION-DEVELOPMENT ENVIRONMENT

Developing software has never been easy, but RAD (rapid application development) apps like Runtime Revolution 2.1 certainly make it easier. In Revolution's helpful, no-nonsense development environment, you can quickly create complex applications with minimal scripting knowledge.

Revolution will be familiar to you if you remember applications like SuperCard, MetaCard, or Apple's own HyperCard. Revolution projects are *stacks* made up of *cards* that contain *objects* like graphics, fields, text, and buttons. Objects, cards, and stacks are all manipulated by *property inspectors* that let you define everything from how a button works to the background color of a card by pointing and clicking instead of the usual scripting and coding.

More-advanced projects will require you to go beyond the basic point-and-click programming. Revolution's scripting language, Transport,

painless transition—for example, Lingo and Transport use the *case* command (for adding variables to your logic structure) similarly.

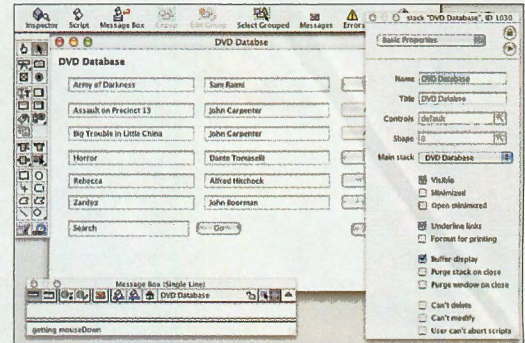
Revolution lets you author once and deploy anywhere (that's developer-speak for easily creating multiplatform software), with runtime support covering Mac OS 9 and OS X, Windows XP, as well as Linux, Solaris, or Unix. By contrast, working in Macromedia Director often requires partial rewrites even for relatively small projects, plus a copy for each platform you want your program to run on, if you want to work on a Mac and run your creations on both Macs and PCs. Our Revolution projects ran flawlessly on every platform we tested on (Mac OS 9, OS X, and Windows XP). They not only ran well but also quickly—and they automatically adapted their look and feel to the host OS, with pretty Aqua buttons in OS X, and, well, Windows-looking buttons in Windows.

For such an accessible program, Revolution packs a lot of power, including the ability to tap into databases like MySQL and parse and manipulate XML. Revolution also makes it easy to tie an application to the Internet for live content updating. You can suck images, movies, and text directly from a Web site or a Web database via HTTP or FTP. A revamped Debugger with Message and Variable Watchers makes scripting much less painful than it was using the previous version. On the downside, Revolution is still a bit buggy and prone to infrequent random freezes.

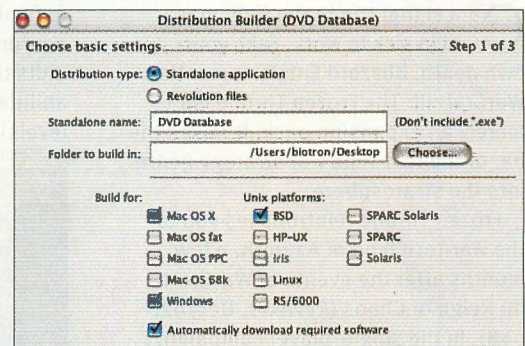
Revolution has several licensing levels, so you only have to pay for the power you need. The Express license allows you to develop on and deliver to only one platform; the Studio

license adds the ability to deliver to any platform Revolution supports; the Enterprise license adds development on all platforms, printed manuals, a ten-incident support package, plus the ability to tap into an Oracle database.

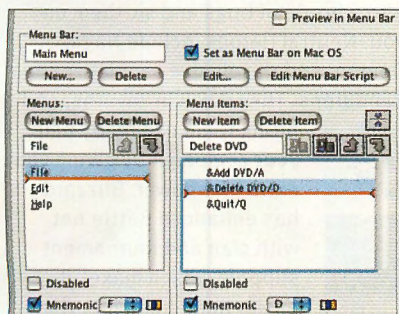
Revolution's ease of use, breadth of features, and write-once-run-anywhere



Revolution 2.1's sensible interface makes software development easier than you'd expect.



Creating a distribution for multiple OS distributions is as easy as clicking a check box for each platform.



Revolution's MenuBuilder takes the pain out of creating OS-specific menus, complete with keyboard shortcuts.

has a great deal in common with rapid-development languages like Macromedia Director's Lingo and HyperCard's Hypertext, and dramatically expands the possibilities of what you can create. There are, of course, differences between languages, but the

basics are very similar, making moving from one environment to the other a relatively

qualities will appeal to anyone who wants to create an application without going to the trouble of learning a core language such as Objective C. Even advanced developers will be impressed by how quickly they can prototype a project in Revolution before committing to coding it out in C. The current version freezes occasionally and still has a few small bugs, but overall Revolution is a robust development tool at an excellent price.—Rick Sanchez



COMPANY: Runtime Revolution
CONTACT: 44 13 17 18 43 33 (U.K.), www.runrev.com
PRICE: \$75 (Express), \$199 (Studio), \$599 (Enterprise)

REQUIREMENTS: 68K or PPC
Mac, System 7.1 or later or Mac OS 10.0.3 or later, 128MB RAM, 20MB disk space

GOOD NEWS: Easy to learn. Excellent features. Inexpensive.
BAD NEWS: A little buggy. Printed manuals accompany only Enterprise license.



WarCraft III: The Frozen Throne

REAL-TIME WAR STRATEGY/ROLE-PLAYING GAME



The Frozen Throne's main campaign, *Terror of the Tides*, teaches us just how bad elves can be.

Cancel that trip to the Bahamas. Call in sick to work. Fake your own death. Blizzard Entertainment's *WarCraft III: The Frozen Throne* isn't merely an expansion pack. It raises the bar of the real-time war strategy genre into the stratosphere.

Frozen Throne reintroduces you to the war-torn land of Azeroth, a few months after the events of *WarCraft III: Reign of Chaos* (*Reviews*, Dec/02, p48). In the single-player campaign, you find the races rebuilding their lands. Reconstruction gets interrupted when Illidan, the outcast Night Elf Demon Hunter, breaks out of his long imprisonment and the Night Elves must recapture him. As the story develops, you encounter a new race, the Naga—mermen with attitude. In grand *WarCraft* tradition, the plot's twists and turns allow you to play from each of the four races' point of view as they quest for the power of the Icecrown glacier.

The campaigns give you the chance

to familiarize yourself with each race's new units and Heroes (powerful units that have multiple spell-casting abilities and can advance to higher levels). The most noticeable new



WarCraft's World Editor lets you take the game to new levels—and yes, those are Pandarens.

combat unit is a not-so-merry band of Blood Elves, high elves gone bad. Blood Elves carry strong antimagic mages, such as the Spell Breaker; can steal magic from enemy spells and flip them to their own use; and control

enemy-summoned units.

The fourth campaign is a standalone story about Orcs building a new homeland, and has more role-playing elements (think *Diablo*) than the first three. Specific elements in this campaign include running errands for characters, solving their problems, and earning awards for deeds. If you dig this hybrid of real-time strategy and role-playing, you can create adventures of your own with the enhanced World Editor. Better yet, the World Editor now lets you add your own cut scenes and voice acting to the maps you create.

The biggest reason to try out Frozen Throne is so that you can play online over Battle.net (www.battle.net). However, you need to modify some of your old *Reign of Chaos* strategies to contend with the characteristics of the new units and Heroes. Don't believe us? Rush your peons at the new Crypt Lord hero, and he'll turn them into a horde of bugs and sic them on you. Neutral Heroes include Naga, Demon, and the elusive samurai-panda Pandarens. They dwell in Taverns, and

hiring them can really help your campaign by giving you extra manpower. Blizzard has enhanced Battle.net with clan and tournament support, which makes it easier to find and join clans and play in tournaments with them.

There is now sea technology in the single-player game (Frigates, Battleships, and so on), but online you can only get transport ships from Goblin Shipyards. Still, Frozen

Throne has so many enhancements we'd be greedy to complain. If you are passionate about *WarCraft* and like a little role-playing in your real-time strategy, you'll love Frozen Throne.

—Matt Osborn



COMPANY: Blizzard Entertainment
CONTACT: 949-955-1380,
www.blizzard.com
PRICE: \$34.95

SYSTEM REQUIREMENTS: 400MHz
G3, Mac OS 9.x or 10.1.3 or later, 256MB
RAM, 550MB disk space, 16MB VRAM,
WarCraft III: Reign of Chaos game

GOOD NEWS: Tons of new units, Heroes, features, and enhancements.

BAD NEWS: Cannot use Frigates and Battleships online. We want more movie-quality cinematic sequences.

MacAddict RATED
★★★★★
GREAT

Dfine 1.0

PHOTOSHOP PLUG-IN

The latest in nik multimedia's series of Photoshop-compatible plug-ins, Dfine 1.0 is primarily aimed at reducing image noise. That's the short version—like a Ginsu knife, Dfine does much more than you might expect.

Noise, simply put, is garbage in your digital photos that shouldn't be there—imperfections added during the capture process. There are two main types of noise: luminance noise, tiny light or dark specks often referred to as digital grain, and chrominance noise, small specks of color that appear where they shouldn't (in skin tones, for example).

Dfine grants you an enormous amount of control, so you can maintain as much detail as possible when reducing both types of noise. If you've tried reducing noise in Photoshop, you know the cost is often an excessive loss of detail. Dfine allows you to apply different NR (noise reduction) intensities to various parts of your image, so you can balance noise and detail as you see fit. You can use the Dfine Selective tool to paint various filters directly where you want them; Dfine even responds to pressure sensitivity in Mac OS X if you're using a tablet.

What's more, you can purchase and load individual camera profiles into the filter; the Olympus E-10 filter we tried worked very well, providing an excellent, color-based starting point for luminance noise reduction. When you find the perfect combination of settings, you can save them, which is particularly handy if you do a lot of shooting in similar conditions or locations.

Dfine also handles other adjustments, including JPEG-artifact reduction, lighting, contrast, and color balance.



Dfine 1.0 demo

Photoshop can handle those tasks, but the inclusion of these features allows you



Dfine did a great job of cleaning up this photo of the "King of Chan Chan," Compay Segundo.

to do all of your retouching in one step via the Dfine interface.

Dfine is great in that it has an array of methods for attacking noise, which varies greatly depending on photos, cameras, and shooting conditions. Also, the app's other features can help streamline your workflow.

On the downside, Dfine is overkill for many image tweekers—and because of all of the variables it considers, it can be slow. Also, at just under \$100, it isn't cheap; and custom camera profiles run you another \$30 to \$50 each. That said, Dfine can produce fantastic results. If noisy images are a problem you haven't yet satisfactorily solved—and especially if you make your living shooting in noise-prone conditions—Dfine is worth the money.—Michael Shapiro

COMPANY: nik multimedia

CONTACT: 888-284-4085 or 619-725-3150, www.nikmultimedia.com

PRICE: \$99.95

REQUIREMENTS: G3 or faster, Mac OS 9 or later,

compatible host app (Adobe Photoshop 4 or later, Photoshop Elements, Corel Photo-Paint, or ComputerInsel PhotoLine 32)

GOOD NEWS: Great results if you're patient. Huge number of options for fine-tuning. Camera-specific profiles available.

BAD NEWS: Perfect tweaking requires patience. Some feature bloat. Camera profiles cost up to \$50 each.

MacAddict RATED
GREAT



My family can't take the risk

of someone stealing my identity and ruining my credit when I get rid of our old Mac



SuperScrubber

only \$29.99

ERASE THE RISK

Getting rid of an old Mac?

Data on your Mac is recoverable even if you delete files, trash files, or reformat your hard drive. Permanently remove data with SuperScrubber's military-strength disk sanitization.



www.superscrubber.com

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Jiiva

Photo-Objects

STOCK PHOTOGRAPHY

Like money in the bank, you can never have enough royalty-free stock images. Variety, quality, and cost are the only issues—and volumes I, II, and III of Hemera Photo-Objects each deliver a mighty 50,000-image bang for the buck.

Available as either eight CDs or one DVD (volumes I and II only), the Photo-Objects images are universally decent-quality. The average image size is 600 by 600 pixels at 300 dpi, making the images great for multimedia and video use, but less appealing for high-end print work that requires large images. At 300 dpi, the images are about 2 by 2 inches—not big enough to enlarge to a full (or even half) page. On



Use the image browser to search for masks, and you'll find 350 alpha-channeled masks.

the bright side, each image includes a perfectly crafted alpha-channel mask, which makes adding it to existing images effortless.

The variety of images in Photo-Objects is simply amazing. To navigate this mountain of objects, an intuitive browser app lets you search for images

by keyword or by more than 80 topical categories. When you install this browser, thumbnails of all of the images are stored on your hard drive, a scheme that delivers very fast searches without forcing you to swap CDs in and out of your Mac. Our searches almost always yielded results—the word *Macintosh*, for example, brought up a few apples and four Macintosh computers (a 128K Mac, a Mac Plus, and a couple of those wacky all-in-one educational machines). When we entered *money*, we got a whopping 1,146 images, including foreign currency, cash registers, and safes.

All in all, Hemera Photo-Objects is one of the all-time greatest graphics bargains in the Mac universe. At around ten good-quality images per penny, you simply can't go wrong.—David Biedny



COMPANY: Hemera
CONTACT: 819-772-8200, www.hemera.com
PRICE: \$99 per volume

REQUIREMENTS: PowerPC,
Mac OS 9 or X, 64MB RAM

GOOD NEWS: Excellent selection of images. Efficient search engine/browser. Completely royalty-free.
BAD NEWS: Images may not have high enough resolution for some print uses.

MacAddict RATED
GREAT

Contribute 2

WEB-SITE UPDATING SOFTWARE

Frequent updates to your company's Web site are a waste of your Webmaster's precious (and well-paid) time. Contribute lets writers and editors who aren't HTML-savvy modify the content on Web pages created by its brother, Dreamweaver MX. Since it uses Dreamweaver's respected HTML engine, we'd trust Contribute to dig into the pages of any Web site we'd manage—where we'd never trust our editorial peers if they were armed with Dreamweaver itself (no offense, guys).

Contribute is especially useful for writers and editors stationed in far-flung or virtual offices. A writer can enter a draft into Contribute, forward the link to a content editor for review, and the editor



In the right collaborative environment, Contribute will save your company's money, as well as your Webmaster's time—and sanity.

can then pass the link to a copy editor who can make changes right on the page. Because no documents change hands, they can't get lost. If something does go wrong, Contribute maintains up to 99 previous versions. Rolling back changes is a simple matter of choosing from a menu.

Contribute doesn't do squat on its own—you need Dreamweaver MX (version 6.1 or later) to set up your site before you

can edit or add to it in Contribute. Think of Contribute as an extra user license for Dreamweaver, with one-quarter of Dreamweaver's price tag—and a similar fraction of its capabilities.

Some of Contribute's features, such as Word and Excel import are Windows-only. Annoying. Also, the spelling checker dialog is nonstandard—it closes and reopens every time it handles a flagged word.

If your site uses dynamic server-side technologies like PHP or JSP, you'll be happy to know that Contribute won't mangle the database hooks in your HTML page—but the trade-off is that you can't use Contribute to edit database content. This peaceful coexistence doesn't quite live up to the claimed dynamic-site support but isn't necessarily a deal killer either.

For its target market—company Web sites with multiple contributors—Contribute is right on the money.—Mary E. Tyler



COMPANY: Macromedia
CONTACT: 800-457-1774 or
415-252-2000, www.macromedia.com
PRICE: \$99

REQUIREMENTS: G3, Mac OS
10.1.5 or 10.2.5 or later, Dreamweaver
MX (to set up site)

GOOD NEWS: Handles most types of Web-content updates for one-fourth the price of Dreamweaver MX.
BAD NEWS: Can choke on custom code. Dynamic-site support is thin.

MacAddict RATED
GREAT

Prepare to meet your makers.



*Unsheathe your razor-sharp
claws and unleash lethal
combo attacks.*

*Use your heightened mutant
senses to detect heat when
tracking enemies.*



*Face off with Sabretooth,TM
Wendigo,TM JuggernautTM
and MagnetoTM.*



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VIOLENCE



ASPYRTM



ACTIVISION[®]



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WiFi Finder

WIRELESS-NETWORK DETECTOR

The premise of Kensington's WiFi Finder is brilliant—sniffing out wireless networks by pushing a button on this small, keychain-attachable device rather than pulling out your laptop and booting it up. But in practice, this device borders on schizophrenic.

You push one button to activate the scanner, and three LED lights flash green to indicate the signal strength of any available network. Alternately, one LED blinks red if the finder doesn't sense network activity within its 200-foot range.

We trolled our office building, where happy, laptop-toting, AirPort-using workers surf the 'Net and check their email wirelessly from everywhere but their desks. Curiously, we saw only



This wireless-network finder is a poster-gadget for great ideas gone awry.

intermittent green flashes on the WiFi Finder. So we walked toward a spot where two access points sit, one AirPort Extreme Base Station and one 3Com-branded device. Still, the WiFi Finder showed us more red LEDs than green, at about a three-to-one ratio.

The WiFi Finder detects network traffic, not the presence of a wireless network. Specifically, it ignores the beacon signal most wireless access points emit to broadcast their availability. To test its ability to detect network activity, we sat down, WiFi Finder in hand, with an AirPort-equipped iBook and started streaming movie trailers from Apple's QuickTime site. Even in this cakewalk of a test, WiFi Finder blinked red more often than not; we saw green LEDs flickering only about 30 to 40 percent of the time.

Even when the WiFi Finder works, its status lights are nearly impossible to see in sunlight. This little gadget proved itself reliable only in its ability to be unreliable.—*Niko Coucouvanis*



COMPANY: Kensington
CONTACT: 800-235-6708,
www.kensington.com
PRICE: \$29.95

REQUIREMENTS: 802.11b or
802.11g wireless network

GOOD NEWS: Cool idea.
BAD NEWS: Only senses networks with active user
traffic—and only some of the time.

MacAddict RATED
○○○○○
50-50

Air DWL-122 USB Adapter

WIRELESS NETWORK ADAPTER

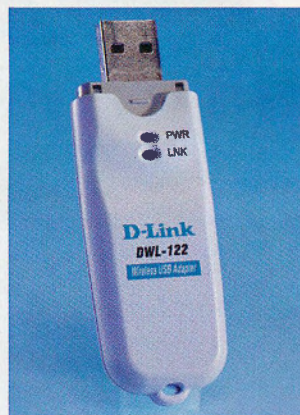
We're all about wireless networking, so we figured D-Link's Air DWL-122 USB network adapter would be just the ticket for getting our AirPortless Macs in on the fun, and it is—in theory. In practice, a removable wireless-network adapter *is* supremely handy, but this one didn't play well with other networking hardware or with some of our test Macs.

Our first attempts with the device were fraught with frustration. After we installed the included software in a 600MHz iBook, plugging in the adapter usually led to a kernel panic—but not every time. The kernel panics were fewer (but still too frequent) in the presence of an open (not password-secured) wireless network signal. We first suspected a conflict with the iBook's AirPort card or software, but

the kernel panicked whether an Apple AirPort card was present or not—even if we removed every trace of AirPort software from the iBook. So we plugged the adapter into an eMac that's never had an AirPort card inside, and its kernel promptly panicked. D-Link's techies couldn't explain the problem—and they admitted that they had never tested it with AirPort. Hmm.

Before doling out the dreaded zero-widget review, we tried the adapter in a couple more Macs: a Blue-and-White G3 and a 400MHz G4. It worked—no fuss, no muss, no kernel panic.

However, even when it does work, this adapter is flawed. It couldn't negotiate the WEP security on our AirPort Base



We took to calling this little guy Colonel Kernel Panic.

Station (nor the same security on a 3Com access point), though it had no problem

joining an unsecured AirPort network. The device worked best with our D-Link wireless router (DI-711), with or without WEP security enabled.

If you already use D-Link hardware or don't mind leaving your wireless network unsecured (so anyone can join), the DWL-122 might work. Or it might cause a lot of kernel panics. Or both.—*Niko Coucouvanis*



COMPANY: D-Link Systems
CONTACT: 800-216-1256 or
949-707-3088, www.dlink.com
PRICE: \$49

REQUIREMENTS: USB-equipped Mac,
Mac OS 10.2 or later

GOOD NEWS: Long cord helps reception. Nice price.
Works great with D-Link networks (usually).
BAD NEWS: Flaky with WEP. Kernel panics galore.

MacAddict RATED
○○○○○
LOUSY

Podzilla

GEAR BAG

Evolved from RoadWired's popular Pod gear bag, Podzilla provides great transportation for your digital camera and accessories, your iPod and its entourage, or your portable CD player and a cache of discs—or everything at the same time, if you're an efficient packer.

Somewhere between a fanny pack and a full-on camera bag, Podzilla can comfortably hold a six-pack of tallboys if you remove the flexible padded insert. There's plenty of Velcro on that padded insert and inside the bag to secure your more-delicate items—camera, lenses, iPod, or what have you.

On the outside of the bag are smart flap-down pockets (RoadWired calls these *winged pockets*), all of which



This handy bag is just what our digital lifestyle needs.

have high-quality zippers spanning the top and both sides. Fully unzipped, the

pockets open out 90 degrees from the bag. Nestled within these outer pockets are no less than 18 pocketlets, pouches, straps, and flaps; we found perfect places to stow AA batteries, PDAs, media cards, cell phones, cables, a large Evian bottle—all the junk we've come to feel naked without.

Podzilla is also versatile when you need a hands-free way to keep your stuff nearby—say, when you're scaling a cliff to capture that perfect photo. In addition to the padded handle on top, there's an adjustable shoulder strap with sturdy, detachable swivel clips, as well as two sets of integrated belt loops on the back, which let you wear the bag high or low.

Podzilla is a top-quality bag, with scratch-free protective padding, water repellency, no-hands carry options, and pockets out the wazoo. The cool name is just gravy.—Niko Coucouvanis



COMPANY: RoadWired
CONTACT: 877-435-5679 or
585-334-6960, www.roadwired.com
PRICE: \$69.95

REQUIREMENTS: Small, portable
items in need of protection

GOOD NEWS: Smart, rugged design. Plentiful pockets.
Good weather and impact protection.

BAD NEWS: Too many pockets so you lose things?
OK, we're reaching.

MacAddict RATED
GREAT

Card Photo Printer CP-300

MINI DYE-SUBLIMATION PRINTER

Like Rodney Dangerfield, we got no respect after printing photos with the Canon CP-300, a small 300-dpi, dye-sublimation printer that pumps out borderless 4 by 6 postcards in about 80 seconds flat. People weren't chiding us for the quality of our work—they were falsely accusing us (in jest) of claiming store-bought postcards as our own prints, evidenced by the undeniable postcard markings on each print's back. And that disbelief is precisely what you'll face when you use this printer to print on Canon's postcard paper—the CP-300 is that good.

The CP-300 produces outstanding images with accurate color, and we didn't have to fuss with any printer settings to get these results. Good detail is present throughout each image—even

detail in shadows. With black-and-white images, black printed black—no weird magenta or blue color casts like we've seen with some inkjets. And due to the nature of dye-sublimation printing, you won't get any banding or detectable ink droplets in your prints.

The printer ships with a rechargeable battery and charger for on-the-road use, though you can juice it with the included AC cord too. It ships with a 4 by 6 postcard paper and ink set (enough to print five postcards). It can also print on credit-card size paper (2 by 3) and mini labels using optional paper and ink sets. However, beyond buying refill sets directly from Canon, replacement media can be hard to find.

With the included postcard paper, the CP-300 printed images in perfect



Inkjet printers are so last week: This wee dye-sub prints the best postcards this side of Photo Hut.

horizontal alignment every time, but a couple of prints were slightly off vertically, causing a bit of image crop on one side and a 1/8-inch white border on the other.

If you don't want prints bigger than 4 by 6 or you need to print on the go, this printer is highly respectable.—Kris Fong

PHOTOGRAPHY BY MARK MADEO



COMPANY: Canon
CONTACT: 800-652-2666,
www.canon.com
PRICE: \$379 (SRP), \$279 (street)

REQUIREMENTS: Power Mac, Mac OS
9.x or 10.1 or later, USB port (for computer
connection) or PictBridge-compatible
digital camera (for direct connect)

GOOD NEWS: Stunning prints with accurate color. Portable.
Quick print times.
BAD NEWS: Ink and paper sets are pricey and not universally
available. Prints don't always line up with the paper.

MacAddict RATED
GREAT

80.0GB ABSplus Desktop-Mac

BACKUP DRIVE AND SOFTWARE

Our little experiment with the Unix command `rm` erased our entire Home folder and taught us a valuable lesson about thorough and frequent backups: Do them. One possible helpmate is the 80.0GB ABSplus hard drive with backup software, a system which lets you back up specific files or folders, or your whole system, as often as you like. Sadly, the drive's simple software doesn't justify the overall system's current hefty price.

The drive itself is a solid FireWire 80GB, 7,200-rpm, 3.5-inch mechanism; the Mac OS X-only software includes a scheduler for setting unattended backups, and lets you choose how much of your drive to backup. You can even make a bootable copy of your whole

system, which is handy, although a CMS Peripherals spokesperson tells us the Blue-and-White Power Mac G3 and original PowerBook G3 may not be bootable from the ABSplus.

An initial backup of our whole system (about 22GB) took about one hour. Subsequent incremental backups took about 10 minutes each.

But here's the rub: The 80GB ABSplus costs as much as Maxtor's new 250GB OneTouch 7,200-rpm drive (\$349.95, www.maxtor.com), which includes Dantz Retrospect Express software.



This backup drive is simple—and simply expensive.

You could get an even better deal by buying an external drive and then purchasing backup software such as the nifty shareware Déjà Vu (\$14.95, <http://propagandaprod.com>).

The ABS plus is handy, but as of press time it's overpriced. CMS Peripherals claims this model will list for \$279 by the time you read this.—Narasu Rebbapragada



COMPANY: CMS Peripherals
CONTACT: 714-424-5520,
www.cmsproducts.com
PRICE: \$349 (SRP), \$299 (street)

REQUIREMENTS: FireWire-equipped G3, Mac OS 10.1 or later, 128MB RAM

GOOD NEWS: Easy to use. Bootable backups are handy.

BAD NEWS: Expensive. Software is basic.

MacAddict RATED



PHOTOGRAPHY BY MARK MADEO

JumpDrive Secure SECURE FLASH DRIVE

Besides looking like a keychain for your Humvee—complete with rubberized finger grips for when data transfers get *extreme*—Lexar's JumpDrive Secure comes with its own security software.

This USB 1.1 drive works on any Mac running Mac OS 8.6 or later.



This drive's security software is a sure sign of evolution.

But once you set it up with the included Safe Guard software—just designate a password and use the handy slider to adjust the size of your Private and Public volumes—the Private volume is safe from anyone who doesn't have Safe Guard (which requires Mac OS 10.2) and the password.

Only one of the JumpDrive's volumes mounts at a time, so you have to launch Safe Guard to switch volumes. Ultimately, though, the security is worth it.

—Niko Coucouvanis

COMPANY: Lexar Media
CONTACT: 510-413-1200,
www.lexarmedia.com
PRICE: \$39.99 to \$199.99 (depending on capacity)
REQUIREMENTS: USB-equipped Mac, Mac OS 8.6 or later (10.2 for security software)

GOOD NEWS: Smart, rugged design. Convenient. Secure.
BAD NEWS: You can secure volumes for free using Mac OS X's Disk Copy. Slow.

MacAddict RATED
GREAT

Zip-Linq RETRACTABLE CABLES

Until all our peripherals go wireless, cables are a fact of computing life. Zip-Linq retractable cabling doesn't relieve our cable dependency, but it makes it less burdensome. We reviewed only the FireWire 6-pin-to-6-pin cable, but frankly, we're ready to buy all 20 available Zip-Linq cable types including USB phone charger, Palm syncer, telephone and Ethernet, FireWire (400 only), and USB 1.1.

The FireWire unit we tried (which works just like other Zip-Linqs) stowed 30 inches of cable into its perfectly portable little round middle piece. The Zip-Linq doesn't carry enough power to support most unpowered FireWire hard drives, but for iPods, DV and digital cameras, cell phones, and other digital appendages, Zip-Linq rules.—Niko Coucouvanis

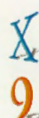
COMPANY: Keyspan
CONTACT: 510-222-0131,
www.keyspan.com
PRICE: \$15.99 (prices range from \$13.99 to \$29.99, depending on type of cable)
REQUIREMENTS: Digital devices in need of connecting.

GOOD NEWS: Huge space savings.
BAD NEWS: Too short for some uses. Limited FireWire power.

MacAddict RATED
GREAT



Zip-Linq is the next best thing to wireless.



NaviPod 3G

WIRELESS IPOD REMOTE

If your home stereo is like ours—an iPod with loud speakers attached—your wait for a wireless remote is over. The NaviPod infrared receiver clips right onto the top of an iPod (you plug your speakers in the back of the receiver). The remote bears the same five control buttons as Apple's wired remote: play/pause, forward, back, volume up, and volume down. An easy-to-access battery powers the remote, while the receiver draws its power from the iPod; we enjoyed a range of about 25 feet. We tested the 3G with a 30GB iPod, but Dr.Bott also sells a NaviPod for older iPods.

We take our other various household remote controls for granted, but this one we love.

—Niko Coucouvanis



iPod not included.

COMPANY: Dr. Bott

CONTACT: 877-611-2688 or 503-582-9944, www.dr.bott.com

PRICE: \$49.95

REQUIREMENTS: iPod, speakers

GOOD NEWS: Simple and functional. Integrated, removable stand.

BAD NEWS: Short wireless range.

MacAddict RATED



GREAT

MacSkate

ATTACHABLE POWER MAC WHEELS

We're constantly plugging and unplugging devices into the back of our Mac, either dragging the case across the floor, tipping it precariously, or contorting ourselves under the desk to get at its ports. And believe it or not, MacGuyvers that we

are, we never thought of mobilizing our Mac by strapping it to a skateboard to make it easier to move around. Well, Marathon Computer did. MacSkate bolts right to your G3 or G4 tower's case, so you know your Mac won't bail when you pull, and the omni-directional wheels are reassuringly sturdy and smooth. The only drawback is that MacSkate tempts us to do stupid things, like ride our skating Mac down the hallway or staircase—very bad ideas—but whose fault is that?—Niko Coucouvanis



PHOTOGRAPHY BY MARK MADEO

Why drag when you can roll?

COMPANY: Marathon Computer

CONTACT: 800-832-6326 or 615-367-6467, www.marathoncomputer.com

PRICE: \$99

REQUIREMENTS: Side-opening G3 or G4 tower

GOOD NEWS: Makes a Mac totally mobile. Sturdy and well made.

BAD NEWS: Bit expensive. You'll want to ride on it, but you shouldn't.

MacAddict RATED



SOLID

Three award-winning products • Now available in one powerful package



Data Safety Suite

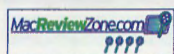
Backup, Undelete and Recover your valuable data

Data Safety Suite is your best protection against data loss.
Judge for yourself. Download a fully functional demo today at www.prosofteng.com/dss

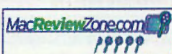
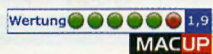
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Data Backup

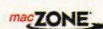
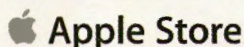


Data Recycler



Data Rescue

Data Safety Suite is available at



or call 1877-4PROSOFT

theHotList

THE BEST OF THE BEST FROM RECENT REVIEWS

NEW THIS MONTH

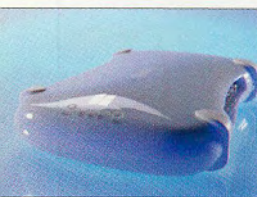
MacSoft Unreal Tournament 2003



Warning: If blood, gore, and violence make you queasy, stay far away from Unreal Tournament 2003. If, however, you share *MacAddict* reviews editor Niko Coucouvanis's deep affection for "unbridled, unabashedly violent mayhem," this game's for you.

Formac Studio TVR

If you're a TV junkie, here's the right rig for your daily fix. Schedule your TV recording, digitize your old analog tapes, and capture video straight into iMovie. But beware: According to reviewer and Renaissance geek Paul Yoon, the Studio TVR "makes TV abuse all too easy."



Leica D-Lux

When we first saw the 3.2-megapixel Leica D-Lux, we doubted its abilities—could it be both gorgeous and talented? In a word: yes. As reviewer and pro photographer Arthur Bleich wrote, "In both form and function, it's virtually flawless."

SOFTWARE

AUDIO

MOTU Digital Performer 3	\$795.00	Feb/02, p58	This pro-audio app has a great array of features.
Propellerhead Software Reason 2.5	\$449.00	Sep/03, p55	It's earned its reputation as the top software sound studio.
Roxio Toast with Jam 5	\$189.95	Sep/02, p49	Burn CDs, MP3 CDs, DVDs, and VCDs, and edit audio.

GAMES

Aspyr Jedi Knight II: Jedi Outcast	\$49.95	Feb/03, p37	Fantastic gameplay with both weapons and The Force.
Aspyr NASCAR Racing 2002 Season	\$39.99	May/03, p57	Realistic NASCAR racing on a Mac? Believe it.
Aspyr The Sims Unleashed	\$29.95	May/03, p58	Pixel-pets abound in the best Sims expansion pack yet.
MacSoft Unreal Tournament 2003	\$49.99	Oct/03, p44	Blood and gore. Violence. More blood, gore, and violence.

GRAPHICS & LAYOUT

Adobe InDesign 2.0	\$699.00	May/02, p50	Look out, Quark—Adobe's rival layout tool kicks butt.
Adobe Photoshop 7	\$609.00	Jul/02, p46	Picture-perfect pixel pusher moves to Mac OS X.
Adobe Photoshop Elements 2	\$99.00	Dec/02, p40	This app has most of Photoshop's power for \$500 less.
FontLab 4.5.2	\$549.00	May/03, p53	The font editor all we type geeks have been waiting for.
Macromedia Dreamweaver MX	\$399.00	Sep/02, p44	Our favorite Web-design tool gets a strong upgrade.
Macromedia Flash MX	\$499.00	Jul/02, p51	It started in animation; now it can do anything.
Macromedia FreeHand MX	\$399.00	Jun/03, p49	In the race with Adobe Illustrator, FreeHand pulls ahead.

PRODUCTIVITY & UTILITIES

Apple Keynote	\$99.00	Apr/03, p48	This presentation app was built for Mac OS X—and it shows.
Bare Bones Software BBEEdit 7.0.1	\$179.00	Mar/03, p52	By far the most powerful text editor money can buy.
Microsoft Office v. X	\$499.00	Feb/02, p42	The 800-pound gorilla of productivity applications.
Prolific Publishing Marine Aquarium 2	\$19.95	Aug/03, p54	OK, it's just a screensaver—but it's the coolest one ever.

VIDEO & ANIMATION

Adobe After Effects 5.5	\$649.00	May/02, p49	This motion-graphics stud improves its 3D powers.
Apple DVD Studio Pro 1.5	\$499.00	Oct/02, p55	Apple's essential DVD-burning app gets even better.
Apple Final Cut Pro 4	\$999.00	Sep/03, p44	This kick-ass video-editor now includes four new apps.

HARDWARE

ACCESSORIES

CharisMac FireWire Dino	\$69.95	Jul/03, p55	Run for your lives! Leapin' lizards, it's a FireWire 400 hub!
Dr. Bott's extendAIR Direct	\$149.95	May/03, p51	Make AirPort Extreme's range noticeably more extreme.
Formac Studio TVR	\$399.00	Oct/03, p48	Watch TV, record TV, digitize tapes—what's not to like?
Kensington Expert Mouse	\$127.95	Oct/03, p60	Optical trackball plus scroll wheel equals killer controller.
MacWireless Power Over Ethernet	\$29.98	Jun/03, p61	Mount an AirPort Base Station 250 feet from AC power.
Palm Zire 71	\$299.00	Aug/03, p44	A PDA, digital camera, and MP3 player all rolled into one.
XtremeMac UFO	\$99.95	May/03, p59	If you own a G4 iMac, you gotta get this way-cool hub.

AUDIO

Apple 15GB iPod	\$399.00	Jul/03, p44	The world's greatest MP3 player gets smaller and cooler.
Digidesign Mbox	\$495.00	May/02, p59	This audio interface is a traveling musician's delight.
Griffin Technology iTrip	\$35.00	Aug/03, p52	This iPod FM transmitter uses the entire frequency range.

DIGITAL CAMERAS

Canon PowerShot S230 Digital Elph	\$399.00	Mar/03, p48	A great 3.2-megapixel camera in a tiny, low-cost package.
Leica D-Lux	\$900.00	Oct/03, p46	Exceptional style married with exceptional image quality.
Nikon Coolpix 3100	\$359.00	May/03, p43	The best point-and-shoot digicam we've seen yet.
Olympus C-4000 Zoom	\$449.00	Jan/03, p52	Great image quality, 4 megapixels, and versatile controls.

DISPLAYS

Apple Cinema HD Display	\$1,999.00	Aug/02, p40	This 23-inch, 1,920-by-1,200-pixel beauty inspires lust.
Formac gallery 2010 Platinum	\$1,399.00	Jan/03, p47	Bright, fast, huge—and it costs only \$.0007 per pixel.

PRINTERS

Brother HL-1870N	\$699.99	Aug/02, p45	Need a sturdy laser printer? This one's a workhorse.
Epson Stylus Photo 2200	\$699.00	Oct/02, p42	The most stunning photo printer we've ever tested.

STORAGE

Apple Xserve RAID	\$10,999.00	Sep/03, p47	Even at over \$10K, this righteous RAID is still a bargain.
LaCie d2 200GB FireWire 800	\$339.00	Jun/03, p47	FireWire 800 speed meets solid-as-a-rock construction.
OWC Mercury Elite Pro	\$319.99	Jul/03, p53	This 180GB FireWire 800 drive outpaces the competition.

SHOPPING?
HERE'S WHAT WE
RECOMMEND

Northern

LUCASARTS ENTERTAINMENT COMPANY PRESENTS

INDIANA JONES

AND THE
EMPEROR'S TOMB™

FIG. 4



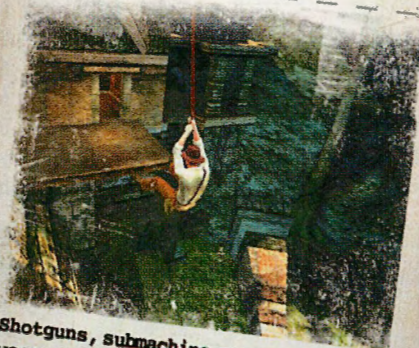
Enter The Heart Of The Dragon



Leap, swim, climb and punch your way through exotic locales.



Original storyline with new villains, wicked enemies and an alluring partner.



Shotguns, submachine guns, improvised weapons – and of course, Indy's trusty whip and pistol.



Violence



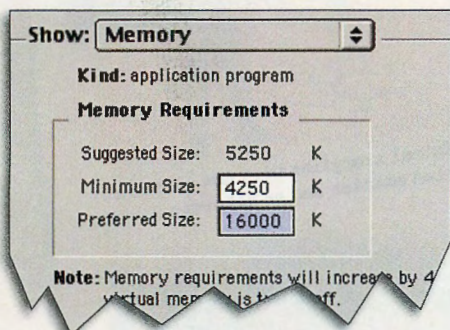
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www.lucasarts.com
www.aspyr.com

GOT A QUESTION?
NEED ADVICE?**ask
us** WE CAN HELP**CLIPBOARD POWER****Is there a way to increase the size of the Mac OS 9 Clipboard?**

The Clipboard size is set by the application from which you're copying. To increase its size, allocate more memory to your application in the Preferred Size field of the Get Info dialog (File > Get Info).



Increasing an application's memory allocation increases the size of its Clipboard.

CHANGE BACKGROUND**Can I change the login screen's blue background in Mac OS X?**

Sure. Create a JPEG file for your background, name it Aqua Blue.jpg, and then replace the original Aqua Blue.jpg file in the Desktop Pictures folder (Macintosh HD > Library > Desktop Pictures). Restart, and you're set.

BYE-BYE NINE**How can I completely remove Mac OS 9 from my Mac OS X system?**

Mac OS 9 doesn't really take up much hard-drive space, but if you're sure you want to get rid of it, trash the Mac OS 9 System Folder and Applications folder. That's it. However, you should first check your OS 9 Fonts folder to see if it contains any fonts you want to save—OS X has been using your OS 9 fonts all along. If so, move 'em to *user name* > Library > Fonts.

IMOVIE SOUND EFFECTS**How can I add my own sound effects to iMovie?**

Record your sounds as AIFF or MP3 files and put them in iMovie's Sound Effects folder. Control-click the iMovie icon in the Finder, then select the Show Package Contents menu item. Navigate to the Sound Effects folder (Contents > Resources > Sound Effects), name a new folder, and put your AIFF or MP3 files in it. Relaunch iMovie to see your aural handiwork.

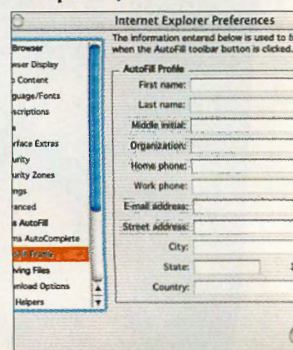
Add your own sound effects.

**MAC OS 9 BOOT CAMP****How do I force my Mac to boot into Mac OS 9?**

While you can hold down the X key during startup to force-boot into Mac OS X, there's no equivalent key command to boot into Mac OS 9. Instead, you must insert a bootable CD or attach a bootable external hard drive and restart while holding down the Option key to choose either the CD or external drive. Now you can use the Startup Disk control panel or system preference to reset your boot drive to Mac OS 9.

EXPLORER AUTOFILL**Whenever I start to type my name into a Web form in Internet Explorer, it autocompletes to incorrect information. How do I correct it?**

Select Preferences in the Explorer menu, click AutoFill Profile in the Forms AutoFill section, then type your correct information in the fields that appear.



Fix your IE AutoFill info here.

PINK PRINTERS**In my Mac OS X Print Center, how do I delete the printers highlighted in pink?**

Printers highlighted in pink are printers that other computers are sharing on your network. When Printer Sharing is enabled via the Sharing system preference, any printer added to or already in your Print Center will be available to all other computers on your

**quick
answers** TO QUICK QUESTIONS**MENU ITEM BEGONE****How do you remove menubar items in Mac OS X?**

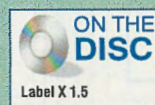
Hold down the Command key while clicking and dragging the item out of the menubar.

CURRENCY CONVERSION**Why does the Mac OS X Calculator's currency converter (Currency > Convert) use a really old exchange rate?**

You need to periodically update the rates from the Internet. To do this, launch the Calculator and select Update Currency Exchange Rates from the Convert menu.

**LABELS IN X****Is there a way to add color labeling to Mac OS X?**

You can wait till end of the year and upgrade to Panther (\$129), which supports file and folder labeling, or check out Unsanity's Labels X shareware app (\$10, www.unsanity.com).

**VISUAL REMEDY****How can a legally blind person**



No whining—
anyone
can do this!



It'll take some
effort, but you
can do it.



This stuff's
for the pros.

UNIX UNIVERSITY



SHOW ME THE DISK SPACE

What's the Unix command for checking available disk space?

In the Mac OS X Finder, you can learn how much free disk space you have by using the Get Info command (File > Get Info). To view this same information in the Terminal, use the `df`—display free disk space—command. To display

statistics about the amount of free disk space on mounted local drives and partitioned drives, type the following command: `df -k -l`. The `-k` option forces the Terminal to display hard-drive stats in kilobytes. The `-l` option limits the search to local, not network, volumes.

```
Terminal — tcsh (tty1)

[node-6-19:~] rmylewski% df -k -l
Filesystem 1K-blocks  Used    Avail Capacity  Mounted on
/dev/disk0s2 19549500  8507148 10046860   43%      /
fdesc      1          1         0    100%    /dev
[node-6-19:~] rmylewski%
```

This cryptic message says our hard drive has 43 percent of its 19.5GB capacity in use.

network—including yours, of course. Therefore, you can't remove them.

ENTOURAGE EMAIL AUTOCOMPLETE

Whenever I begin to type an address into the To field of an Entourage email message, it offers me the choice of

bazillions of email addresses that aren't in my Address Book. How do I stop this? Microsoft Entourage remembers both Address Book email addresses as well as addresses from recently received mail. To purge the latter

set of addresses, choose Mail & News Preferences from the Entourage menu, click the Compose tab, and click the Clear List button.

POWER TRASHING

My Mac crashes every time I try to put a certain recalcitrant file into the Trash, what can I do?

In Mac OS X, you can eliminate the troublesome file by taking a quick trip to the Terminal. Open the Terminal (Applications > Utilities > Terminal) and type `rm`, followed by a space. Then drag the troublesome file into the Terminal window and press Return. *Hasta la vista*. Warning: There is no Undo for the `rm` command.



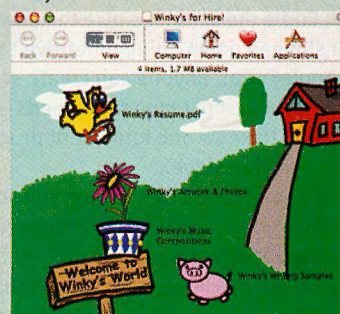
ThisMonth

66 Make AppleScript Do Your Dirty Work

Just say no to rigmarole, nitty-gritty chores. Make AppleScript automatically launch your usual apps and folders, load beloved Web sites, and play your favorite tunes.

71 Create a Custom Disk Image

You've seen some developers' crafty disk-image work in their software on the Disc. Now learn how to create your very own.



72 Compile Unix Apps for Mac OS X

Why wait for developers to port Unix apps to Mac OS X when you can do it yourself? We show you how with some help from the Swedish Chef. Bork, bork, bork!

76 iChat or I-Spy with a Webcam

You don't need iSight to videoconference; any FireWire or DV camera will do—we show you. And if you're not one to chit-chat, we show you how to set up a spycam that you can view from anywhere in the world.



Seven years of handling tech support for Apple, Power Computing, and a Texas school district have given Buz Zoller Mac superpowers.

Submit technical questions or helpful tips directly via email (askus@macaddict.com) or c/o MacAddict, 150 North Hill Dr., Brisbane, CA 94005.

White-on-black text is a godsend for visually impaired Mac addicts.



DON'T BREAK YOUR BASE STATION

If I replace the wireless card inside my original graphite AirPort Base Station with an 802.11g card, will it operate faster?

No—in fact it won't work at all. The graphite AirPort Base Station uses a standard Orinoco Wavelan PC card, but it works with only that card.

Don't replace the Base Station's PC card.



PHOTOGRAPHS OF AIRPORT AND ISIGHT/COURTESY OF APPLE

Make AppleScript Do Your Dirty Work

by Ed Haynes and Kris Fong



WHAT YOU NEED

- AppleScript, part of OS X (\$129, www.apple.com)

In a world of repeat offenders, repeat performances, and Eddie the Echo, it's nice to know you don't have to get slogged down doing repetitive tasks on your Mac. With AppleScript, anyone can create scripts that take care of some of your most mundane deeds—don't worry, you don't need to know one iota about programming to make an application your slave.

We get you started by showing you some basic AppleScript commands you can use to automate everyday tasks such as launching all the apps you use daily or frequently used folders, fixing disk permissions, opening your usual Web sites, and playing your favorite tunes. We then show you how to turn your scripts into a Cocoa application that will carry out your tasks with a mere click.

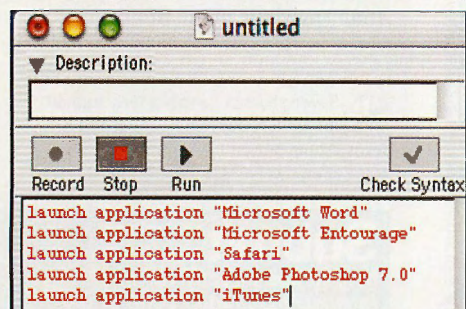


Rather than repeatedly opening your daily apps, folders, Web sites, and favorite songs, you can easily create scripts that launch everything at once.

IMAGE COURTESY OF APPLE COMPUTER

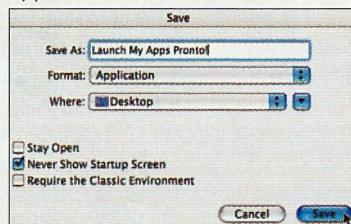
Launch Apps Automatically

1 Compose the Code If you launch a group of apps on a day-to-day basis, create a script that opens all of them at once. Launch Script Editor (Applications > AppleScript); in the editor window, the bottom box is where you write the script (filling in the top Description box is optional). Type *launch application*, type a space, and then type the name of one of your apps, enclosed in double quotes (""). Press Return and repeat the process for all other apps you wish to launch. Be sure to type application names exactly as they appear in the Finder.



Just type a list of your usual apps, and you'll be able to launch them all with a single double-click.

2 Check It and Run When you're finished, click the Check Syntax button to have AppleScript format your script—if it doesn't, correct your mistakes and try again. Once it's formatted, click Run to watch your script in action. Then save it by selecting Save from the File menu. In the resulting dialog, name your script (for example, App Launcher Script) in the Save As field, select Compiled Script from the Format pop-up menu, and click Save to preserve your handiwork. Then save the script as an application for use. Select Save As from the File menu, give

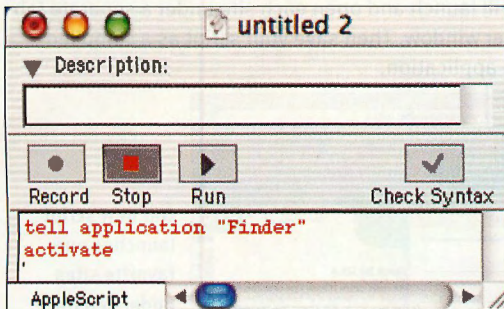


After test-running our script, we saved it as a compiled script (to preserve our scripting), and then as an application (for actual use).

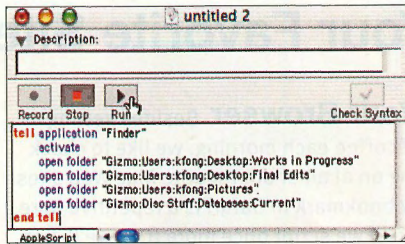
it a name (for example, App Launcher), select Application from the Format pop-up menu, check the Never Show Startup Screen box, and click Save. Now, anytime you want to launch your programs, just double-click your new app.

Open Folder Sets

1 Activate the Finder We open the same set of folders every day for our work. Luckily, we can have AppleScript do this for us instead. Open a new Script window (Command-N), and type *tell application "Finder"* in the scripting box; this selects the Finder. Press Return, type *activate*, and press Return again.



Issuing commands like a drill sergeant, we can make the Finder do our grunt work.

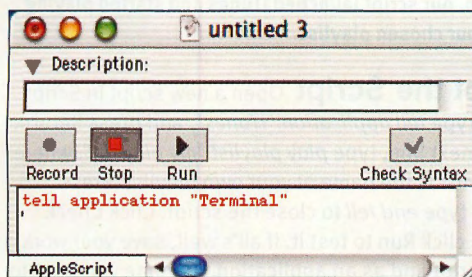


After we formatted our script by clicking **Check Syntax**, we clicked **Run** to test it.

2 Target Folders To add folders, type *open folder*, a space, and then the path to the folder, enclosed by double quotes; separate each folder in the path with a colon (:). For example, to open your Applications folder, type *open folder "Macintosh HD:Applications"*, where *Macintosh HD* is the name of your hard drive. Press Return and repeat these steps for all other folders you wish to include in your set. Then type *end tell* on a new line, click **Check Syntax** to format your script, and click **Run** to test it. Resize and position your folder windows the way you want them to appear on your desktop. Finally, close them and save your script as a compiled script (for future editing) and as an application (for use).

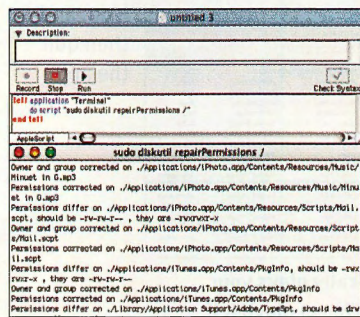
Fix Disk Permissions

1 Call Upon the Terminal You can script many apps to make your life easier, and the Terminal is no exception. Rather than launch the Terminal and type out commands every time you want to do some system maintenance, you can create an AppleScript that launches the Terminal and types the commands to, say, run the repair Permissions disk utility for you. To do this, open a new script window and type *tell application "Terminal"* on the first line. Then press Return.



To script an application, select it first by typing the *tell application* command.

2 Execute the Terminal Command To make the Terminal execute a command, type *do script* and type a space. Then type *"sudo diskutil repairPermissions /"*. Press Return, type *end tell* (close all *tell* commands with an *end tell* command), and then click **Check Syntax** to format the script and **Run** to test it; the Terminal launches and asks for your administrator password. Type this into the Terminal and press Return, and the utility goes to work, repairing any disk permission oddities on your hard drive (this may take some time—you'll know it's finished when you see your user name and prompt again). Save



your script as a compiled script and an application.

We had no idea how screwed up our disk permissions were—luckily all we have to do is double-click our script the next time we need to do some maintenance.

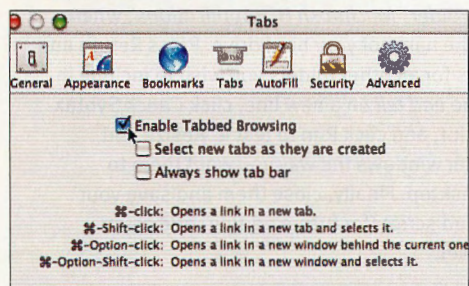
DO MORE WITH LESS EFFORT

We showed you a few ways that you can use AppleScript to automate tasks, but you don't necessarily have to create a separate script for everything. You can take everything you just learned and combine all the syntax into one superscript. For example, instead of double-clicking your app launcher, folder-sets opener, Web-site launcher, and music-player scripts every morning, you can combine all four scripts into one "launch everything" script that'll launch your apps, folders, URLs, and playlist in one double-click fell swoop.

If you want to be lazy (or maybe just efficient), drop your new superscript in the Dock, and you can launch everything with just one click instead of double-clicking. Better yet, you can execute your script without clicking at all if you set it as a login item. Open System Preferences, click Login Items, and click Add. In the resulting dialog, navigate to and select your superscript, and then click Add. Now anytime you boot your Mac, your script will have everything waiting for you—without you lifting a finger.

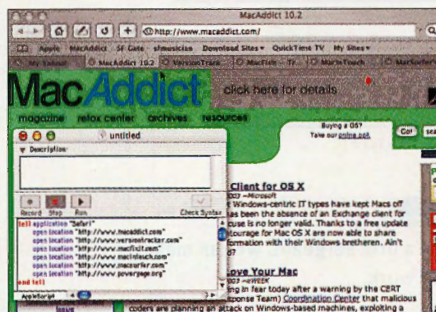
Launch Your Favorite Sites

1 Activate Your Browser Besides getting that first cup of coffee each morning, we like to check out what's going on at all of our favorite Mac Web sites. Selecting every bookmark in Safari is a repetitive bore, but a chore we can ignore if we script once more (OK, we'll stop with the rhyming). First make sure tabbed browsing is enabled in Safari. Launch Safari, select Preferences from the Safari menu, click Tabs, check the Enable Tabbed Browsing box, and then quit the app. Then open a new script in Script Editor, type *tell application "Safari"*, and press Return.



To make Safari open all of your URLs in one window, enable tabbed browsing.

2 Add Favorites For any URL you want to open, type *open location "http://www.macaddict.com"*, where *http://www.macaddict.com* is your desired URL. Press Return and repeat the process for all other URLs you'd like to launch simultaneously. When finished, type *end tell*, click Check Syntax to format the script, and then click Run; Safari will launch and open each site under a separate tab in one browser window. Then save your script as a compiled script and an application.



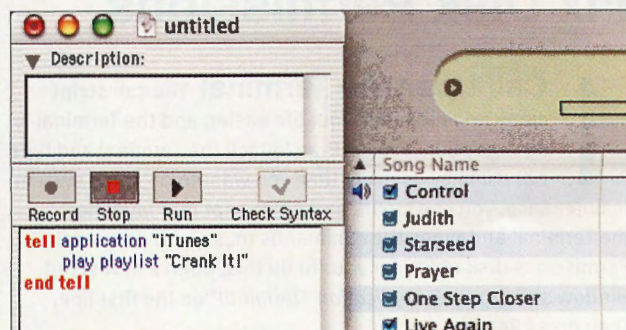
Our new script launches our favorite sites under separate tabs—just click a tab to view the site.

Play Your Favorite Songs

1 Create a Playlist If you're lazy like us, you can create a script that automatically launches iTunes to play your favorite songs. First, create a playlist of your favorite songs in iTunes if you don't have one already; in iTunes, select New Playlist from the File menu and type a name for your playlist. Click the Library (in the left column under Source), drag and drop your favorite songs onto the new playlist icon, and then quit the app.



To make a script that automatically plays your favorite songs, first create an iTunes playlist if you haven't got one already.



After clicking Run, our script launched iTunes and started playing the first song in our chosen playlist.

2 Script the Script Open a new script in Script Editor, type *tell application "iTunes"*, and press Return. On the next line, type *play playlist "my playlist"*, where *my playlist* is the name of your own playlist. Press Return and then type *end tell* to close the script. Click Check Syntax and then click Run to test it. If all's well, save your work as a compiled script and as an application. Anytime you want to hear your favorite songs, just double-click the application.

COMMANDEER THE COMMANDS

While the command for launching an application is self-explanatory, many other AppleScript commands aren't as obvious. Fortunately, you can cheat by calling up the AppleScript Dictionary, which lists every command available for every scriptable app you have installed on your machine and explains how to use them.

To open the Dictionary, select Open Dictionary from

the Script Editor's File menu; the resulting dialog lists all applications that can be controlled via AppleScript. Select any app and click Open. The selected app launches along with its Dictionary window, which lists every command you can use to control that particular app. Click any command in the Dictionary window to get a description of what it does and how to use it in Script Editor.

Turn Scripts into Applications

by Ed Haynes

TRICKY

WHAT YOU NEED

- AppleScript, part of OS X (\$129, www.apple.com)
- Apple Developer Tools, December 2002 or later release (free, either on Apple's Developer Tools CD or as a download from <http://developer.apple.com/tools/macostools.html>)
- Scripts—your own or someone else's

Running a multitude of individual application scripts isn't always practical (we're assuming you didn't already create one big superscript). Luckily, with AppleScript Studio, a part of Apple's Developer Tools package, you can build your own Cocoa application to launch the scripts you've already made or any third-party scripts you want to group together. Note: If your Developer Tools version predates the December 2002 release, you need to download the latest package from Apple's site.



Repetitive launching, opening, and selecting are things of the past—with AppleScript Studio, you can create a Cocoa app that does your deeds at the click of a button.

1 Install and Set Yourself Up If you haven't done so already, install Developer Tools. Then go to Developer > Applications, locate Project Builder, and launch the application. If you've never used this app before, you'll be greeted by an Assistant window that'll set you up as a new user. Use the Assistant to choose where to store product builds, what type of window environment you'd like to work in, and how you'd like to have projects saved and closed (we chose all the defaults). Click Finish when you're done.

Once you install Developer Tools, launch Project Builder to begin creating your own application.

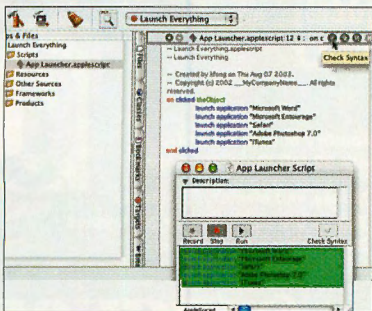


2 Create a New Project In Project Builder, select New Project from the File menu; in the resulting window, select AppleScript Application from the Application category, and then click Next. In the resulting screen, name your project in the Project Name field, and then click Finish; Project Builder launches an interface for your project.

Select New Project from the File menu to build the framework for your pending application.



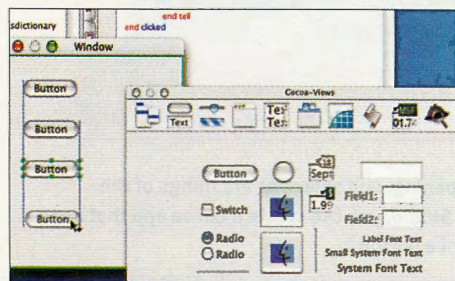
3 Paste In a Script In the Groups & Files column, click the Scripts disclosure triangle to reveal a blank script file that bears the same name as your project. Rename this as one of the scripts you created (for example, App Launcher.applescript); Control-click the script name, select Rename from the contextual menu, and type the new name. Then double-click the corresponding compiled script to open it in Script Editor, select all text, copy it, click in the Project Builder interface's right-side scripting window below the text info, and paste in the script. Modify it by typing *on clicked theObject* above the script's first line, and then typing *end clicked* as the last line. Click the checkmark to format the script.



After pasting in and modifying the existing script, format it by clicking the checkmark.

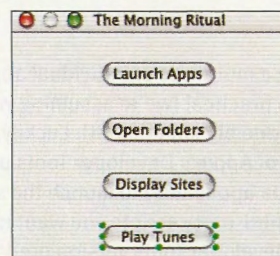
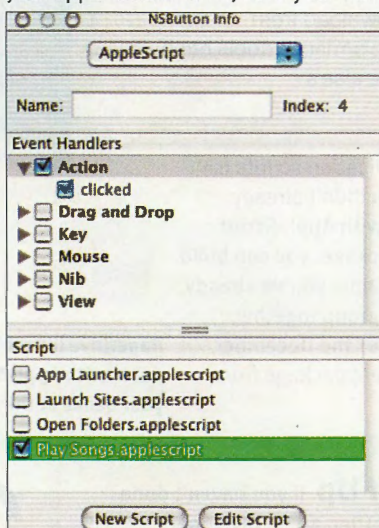
4 Add Other Scripts To add more scripts, click Scripts in the Groups & Files column, and then select New File from the File menu. In the resulting Assistant window, select AppleScript File, click Next, type a script name in the File Name field (for example, Open Folders.applescript), and click Finish to add the file to the Scripts folder. Double-click your corresponding compiled script, copy and paste the text into the Project Builder window, modify the script by adding the same two lines mentioned in step 3, and click the checkmark to format it. Repeat for all other scripts.

5 Build a Push-Button Interface Click the disclosure triangle next to Resources, and double-click MainMenu.nib to open it in Interface Builder; an empty window named Window and a series of tool palette windows appear. In the window with Cocoa in the title, click the cocoa-views button (the translucent button icon with the word Text beneath it) to display its graphics. Drag and drop the Button graphic from the Cocoa-Views window onto the Window window—drag as many buttons as you have scripts (in our case, we dragged four buttons).



The buttons you see here will launch each of our scripts, and the Window window will ultimately become our app's interface.

6 Set the Interactivity and Build It Select your first button. From the Tools menu, select Show Info. Select Attributes from the top pop-up menu, and then type a name that describes one of your script's actions in the Name field (for example, Launch Apps). Then select AppleScript from the top pop-up menu. From the Event Handlers list, check the Action box (this also checks the Clicked box), and then check the corresponding AppleScript from the Script list. Repeat for all other buttons. Select the Window window, select Attributes from the Info window, give your app a window title, save your work, go back to Project Builder, and save your project. From the Build menu, select Build to save your new app in your project folder's Build folder.



To program each button's interactivity (right), just link its graphic to the corresponding script using the Info window (left).

Ed and Kris wish TV script writers were as diligent as AppleScripters.

- 800 dpi
- For righties + lefties
- Optical tracking

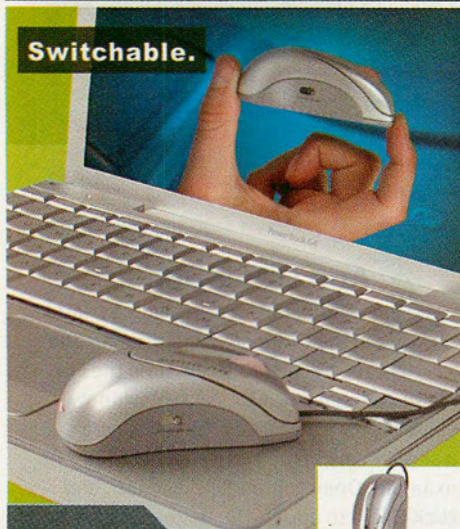
OPTICAL

Mini-Mice for Macs

Three handy alternatives to touchpads for professionals on the go

800
dpi resolution

Switchable.



USB Optical Mini Mouse
400, 600, 800 dpi

- Switch allows selection of 400, 600, or 800 dpi resolution to adjust sensitivity
- Small and light weight
- Works in tight spaces

GME222

Wireless.

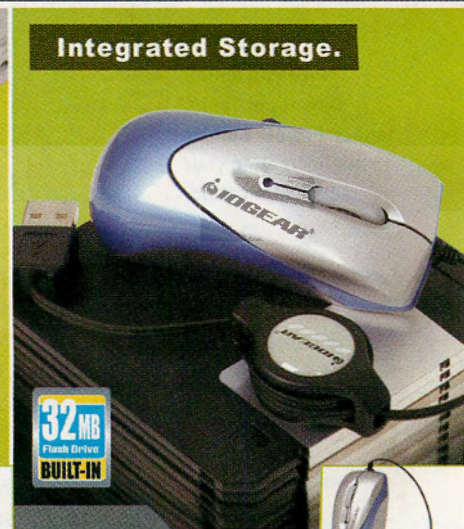


USB RF Wireless
Optical Mini Mouse, 800 dpi

- Eliminates cords
- On/off switch conserves power
- Rechargeable thru USB charger (included)

GME223R

Integrated Storage.



Memory Mini Mouse 800
with 32 MB Flash Memory

- Mouse and memory, all-in-one
- Stores the equivalent of 30 floppies
- Retractable ribbon cable

GME224M32

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Create a Custom Disk Image

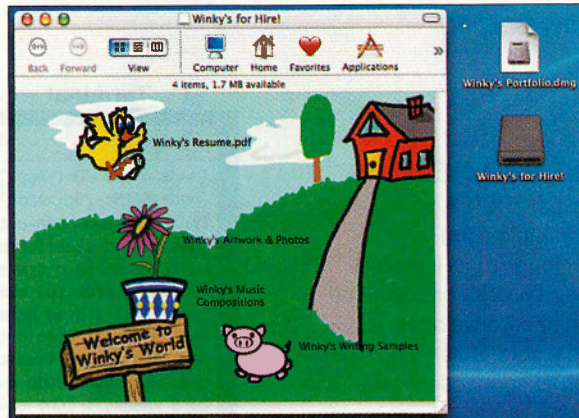
by Kris Fong



WHAT YOU NEED

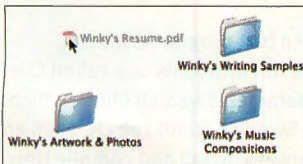
- Disk Copy, part of Mac OS X (\$129, www.apple.com)

When it comes to delivering software programs, portfolios, or files in Mac OS X, nothing beats Apple's stalwart Disk Copy. It costs diddly-squat to make a disk image (unlike software installer makers, whose manufacturers charge a licensing fee for distribution), plus you can create read-and-write disk images for collaborative work with others. But the coolest part about a disk image is that you can add a photo, your own artwork, or a company logo in the window background behind your files to create a unique delivery package. Integrate your own custom icons, and you can make your product or portfolio really shine. Here's how.



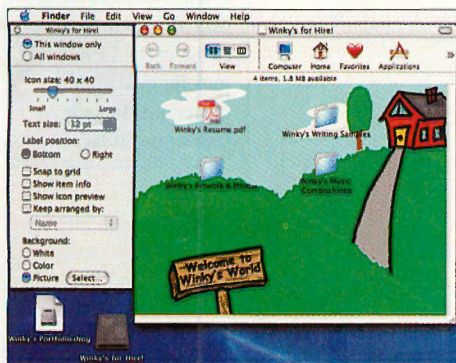
Default file and folder icons are boring if you're delivering a disk image to the masses. If you want real attention, spunk things up with a little window treatment and icon imagination.

1 Scrounge Up Stuff To make a disk image, first round up everything you want to put in it. If you don't already have your targeted files stored in one location, create a new folder, name it accordingly (the name you pick will appear as the name of your final volume), and copy any relevant files, folders, and text docs to it. Don't worry about keeping everything tidy—we'll deal with that later.



Herd all of the files you want to deliver into one folder.

3 Pretty Up the Package Double-click your new .dmg file to mount the disk image volume, and then double-click the volume to open its contents. From here, you can add more content if you need to and spiff up the presentation. To display a graphic (a photo, logo, or what have you) as the window backdrop, select Show View Options from the View menu, and select the This Window Only option. Then select Picture from the Background options, click the resulting Select button, navigate to and select your image file, and click Select.



Once you select a picture from the view options, it'll display behind your disk volume contents as a window backdrop.

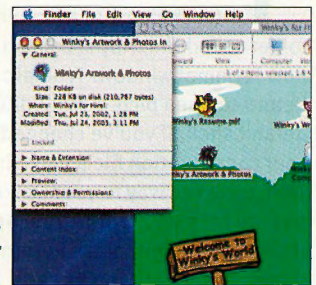
2 Do the DMG To turn your folder and its contents into a disk image, launch Disk Copy (find it in Applications > Utilities), and then drag and drop the folder onto the Disk Copy window. In the Save As field in the resulting dialog, type a name for the disk-image file (this can be different from the volume name) with a .dmg extension. Select Desktop from the Where drop-down menu. From the Image Format drop-down, select Read/Write, and then click Save to create the disk image.



Selecting Read/Write allows you to make changes to the disk image after it's been created.

4 Add Final Touches If you want custom icons, copy and paste in the Info dialog (Command-I). In the view options window, boost their size using the Icon Size slider, and choose to display names below icons or to the right of them. Then move icons to their final resting place, close the window, and drag the volume to the Trash to unmount it. That's it! To compress the image, in Disk Copy select Convert Image from the File menu, and in the resulting dialog navigate to your .dmg and click Convert. In the resulting dialog, type a name in the Save As field, select Compressed from the Image Format drop-down, and click Save.

If you really want to be clever, paste icons that integrate with your background over the originals.



Senior Editor Kris Fong is a big fan of Colorforms. She thanks Apple for inadvertently bringing it into the 21st century.

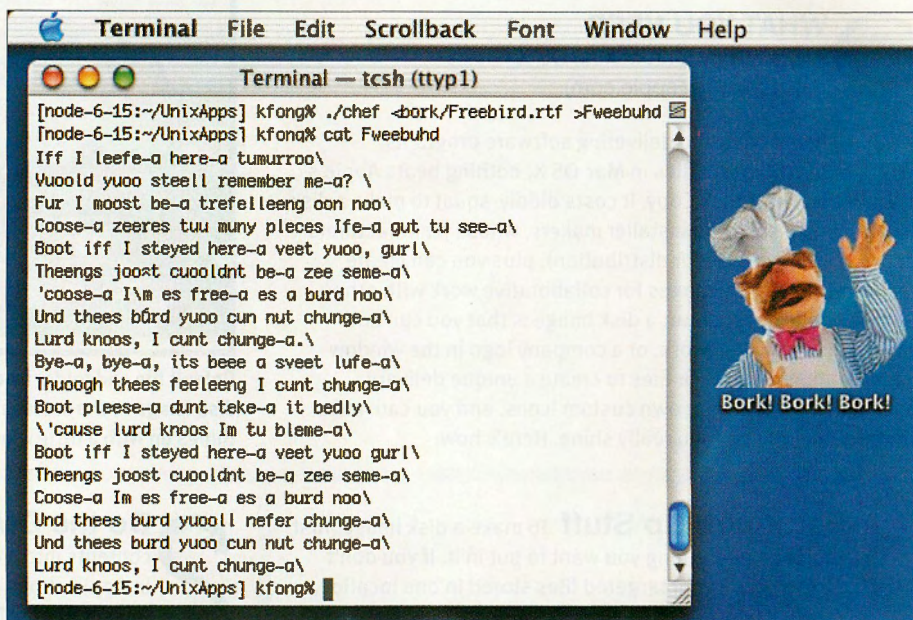
Compile Unix Apps for Mac OS X

by Mary E. Tyler



WHAT YOU NEED

- Mac OS X (\$129, www.apple.com)
- Developer Tools installed (free with OS X or download from <http://developer.apple.com/tools>)
- Internet connection



Compiling programs needn't be a stodgy affair—many Unix gems, like Swedish Chef, will run freely in Mac OS X “veet joost a fyoo tveeks.”

There are hundreds of thousands of Unix programs out there, and they're yours to be had if the compile is right.

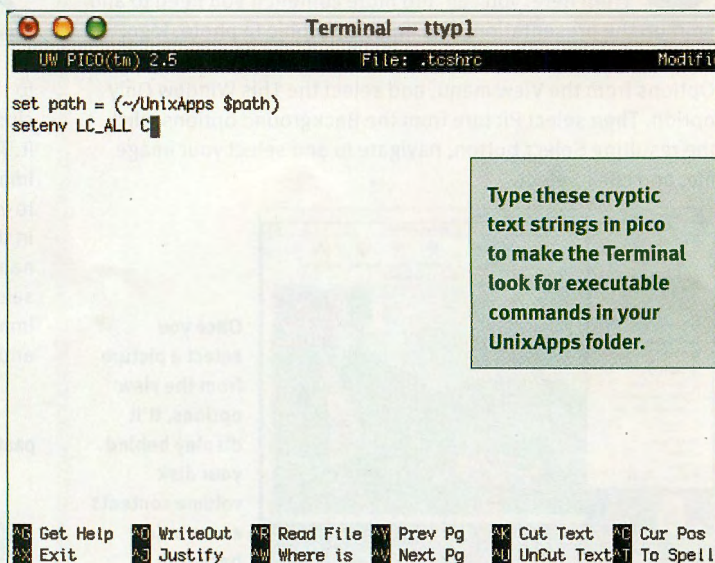
We showed you how to use Fink to install Unix apps ported to Mac OS X (“Run Unix Apps in Mac OS X,” May/03, p64)—now we show you how to whip some nonported Unix apps into shape so that you can run them on your machine in Darwin, using the Terminal.

To initiate you into the world of compiling, we demonstrate by showing you how to turn a lex file (Lex is a Unix app used

to create complex find-and-replace text programs) into a C program file; our guinea pig was a fun little Unix app called Chef (named for the classic Muppet character, Swedish Chef), which translates English text into mock Swedish (poot zee cheeken en dee uffen...). We then show you how to install and compile Unix apps by compiling Lynx, a Unix text-based browser. Take what you learn and apply it to other Unix applications, but keep in mind that many Unix apps won't run in OS X no matter what you do. The only way to find out is to compile them first—here's how.

Go Svedish

1 Get On the Right Path First designate a folder from which the Terminal can search for executable commands. Go to your user folder (click Home in a Finder window) and create a new folder called UnixApps. Launch the Terminal to open a new Terminal window. Type **pico .tcshrc** and press Return to open pico, a text editor (.tcshrc is the Terminal's default shell; if you've changed your default shell, type your configuration file's name in place of “.tcshrc”). Then pave the way to your UnixApps folder by typing **set path = (~/.UnixApps \$path)**, and press Return (from here on out, press Return after typing each text command). Then type **setenv LC_ALL C**, which will suppress warnings later. To save your work, press Control-O, Return, and then Control-X to exit pico. Quit the Terminal and then relaunch it.



2 May the Source Be with You Now download the Chef app to your UnixApps folder: Type `cd UnixApps` to navigate to the UnixApps folder. Then type `curl ftp://tbrowne.best.vwh.net/swedish_chef/` (no space) `bork.tar.Z -o bork.tar.Z` to download the file to the folder—the `-o bork.tar.Z` part of the command saves the output (the download) to the file `bork.tar.Z` instead of to the Terminal window. When you see your user name and prompt (this lets you know that the download has finished), decompress the tar file by typing `tar -xzf bork.tar.Z`—the flags that follow the `tar` command are shortcut ways of saying extract, unzip, give verbose messages, and use this file.

```

Terminal — tcsh (tty1)
Last login: Wed Aug 13 17:04:18 on tty1
Welcome to Darwin!
[node-6-48:~] kfont% cd UnixApps
[node-6-48:~/UnixApps] kfont% curl ftp://tbrowne.best.vwh.net/swedish_chef/bork.tar.Z -o bork.tar.Z
% Total    % Received % Xferd  Average Speed   Time    Time     Current
                                 Dload  Upload   Total   Spent    Left     Speed
100 6222  100 6222    0     0  562      0  0:00:11  0:00:11  0:00:00  3462
[node-6-48:~/UnixApps] kfont% tar -xzf bork.tar.Z
bork
bork/README
bork/README.bork
bork/chef.x
bork/hagerman.note
[node-6-48:~/UnixApps] kfont%
  
```

Once you download and extract the compressed Chef file, the Terminal displays the app's contents in the window.

3 Lextacy? Lex to C Type `clear` at the prompt to get a clean slate. Then type `cd bork` to navigate to the bork folder, and type `ls -l` to see its list of files. The file `chef.x` is the prized Chef app, but it also happens to be a Unix lex file. To convert the file to a C file, type `lex chef.x`. Then type `ls` to list the folder contents and see a new `lex.yy.c` file. To compile this new file in C, type `cc -o ../chef lex.yy.c -ll` (`cc` is the Developer Tools C compiler, the flag `-o` sets the next argument as the destination file name, `../chef` creates a program named `chef` in the folder above the current folder, `lex.yy.c` is the affected file, and the `-ll` flag links the program to the share libraries and compiles it). Now type `cd ..` to move to the parent directory, and type `ls` to list the files—there's the Chef app!

4 Svedify Your Text To make Chef translate a text document, feed it two bits of info—the file name you want to translate (written as a path) preceded by a left arrow (`<`), and a new file name for the saved output preceded by a right arrow (`>`). For simplicity's sake, toss any text file into the bork folder in the UnixApps folder. In the Terminal, type `clear` to get a clean slate. Then type `./chef <bork/CompileApps.rtf` (space) `>SvedifiedAppText` (where `CompileApps.rtf` is the name of your text file, and `SvedifiedAppText` is whatever name you want your new translated doc saved as). To check out your new Svedish file, type `cat` followed by the name of your saved file (we typed `cat SvedifiedAppText`), or simply open the file in TextEdit.

```

Terminal — tcsh (tty1)
[node-6-15:~/UnixApps] kfont% cd bork
[node-6-15:~/UnixApps/bork] kfont% ls -l
total 32
-rw-r--r--  1 kfont  staff   827 Apr 30  1993 README
-rw-r--r--  1 kfont  staff  1242 Dec 17  1992 README.bork
-rw-r--r--  1 kfont  staff  1789 Apr 30  1993 chef.x
-rw-r--r--  1 kfont  staff  1619 Apr 30  1993 hagerman.note
[node-6-15:~/UnixApps/bork] kfont% lex chef.x
[node-6-15:~/UnixApps/bork] kfont% ls
README      README.bork  chef.x      hagerman.note  lex.yy.c
[node-6-15:~/UnixApps/bork] kfont% cc -o ../chef lex.yy.c -ll
[node-6-15:~/UnixApps/bork] kfont% cd ..
[node-6-15:~/UnixApps] kfont% ls
bork      bork.tar.Z  chef the finished compiled C program
[node-6-15:~/UnixApps] kfont%
  
```

This little text string compiles our Unix program into an OS X-compatible C program.

5 Speeken Zee Svedish? Bring the Swedish Chef to life (sort of) by making your Mac speak Svedish. In the Terminal, type `curl http://www.cis.rit.edu/~jerry/Software/MacOSX/say_` (no space) `1.1.tar.gz -o say_1.1.tar.gz` to download Say, an app that speaks words. Decompress the file by typing `tar -xzf say_1.1.tar.gz`. Type `cd say` to go to the say directory, and type `make test`; Say should speak a greeting to you. To use Say interactively, type `./say`; your Mac will speak anything that you type hereafter. To make it shut up, press Control-D. To make it speak Svedish, have Say read your translated file by typing `./say -f ../SvedifiedAppText` (substitute your own file name for `SvedifiedAppText`).

Just use the `cat` command to read your newly translated file—sveet!

```

Terminal — tcsh (tty1)
[node-6-15:~/UnixApps] kfont% ./chef <bork/CompileApps.rtf
[node-6-15:~/UnixApps] kfont% cat SvedifiedAppText
{vrtf1wacvansicpg18000cocoartf182
{vfonttbl{v0fswiss{vcharset77 Halfeteeaa;
{vcolortbl;vred255vgreen255vblue255;
vmargin1440vmargin1440view9000view9000viewind0
vpardvqlvgnatural
v0fsws24 vcf0 Cumpeele-a Uneex Epps fur OoS X\
Zeere-a ere-a hoondreds ooff thuusunds ooff Uneex prugrams oooat zeere-a, un
d zeey ere-a yuours tu be-a hed iff zee cumpeele-a is reeght. Ve-a shoood yuo
o hoo tu use-a Feenk tu instell sume-a Uneex epps thet hed bees purted tu Mec
OoS X; noo ve-a shoo hoo yuoo cun vheep sume-a ooff zee nun-purted Uneex epp
s intu shepe-a tu roon oon yuoor mecheene-a.\
Tu ineeitee-a yuoo intu zee vurld ooff cumpeeling, ve-a demunstrate-a by sho
oeng yuoo hoo tu cumpeele-a a faan leettie-a Uneex app called Svedeeesh Cheff
(named effer zee clessee Mooppet character), vheech translates Ingleshe te
xt intu muck Svedeeesh (\d2poot zee-a cheeke ee dee-a oofee\c9\ds). Yuoo c
un zeen teke-a vhet yuoo\dsve larned and epply it tu ooezer Uneex eppleeces
huns. Du keep in meend thet munny Uneex epps vun\dst roon under OoS X nu mett
  
```

```

Terminal — tcsh (tty1)
[node-6-15:~/UnixApps/say] kfont% ./say
pitch: 53.43
rate: 188.00
voice: default system voice
[ctrl]-[d] or EOF to end.
hey, check this out
## Component Manager: attempting to find symbols in a component alias of type (reg/carp/xibt)
good morning, good afternoon, good evening, and good night
who is your daddy and what does he do
oh I wish I were an Oscar Meyer Weiner, cuz that is what I'd truly like to be
^D
[node-6-15:~/UnixApps/say] kfont% ./say -f ../SvedifiedAppText
pitch: 53.43
rate: 188.00
voice: default system voice
[ctrl]-[d] or EOF to end.
## Component Manager: attempting to find symbols in a component alias of type (reg/carp/xibt)
  
```

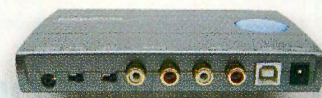
Heerz how zee Svedish Cheff trunslated owwer arteecle's oopeneeng text. Guud, yeeh? Bork, bork, bork!

Heard any good music lately?



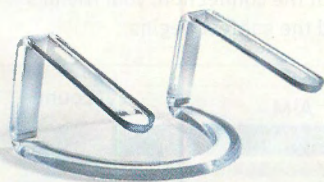
The PowerWave USB Audio Interface & Desktop Amplifier is a powerful and extremely flexible computer audio tool. With it you can record any mic or line input into your computer. Record your entire album collection to make CDs or MP3s. Hook-up a mic and musical instrument and turn your computer into a recording studio.

But PowerWave is also an integrated desktop amplifier. Use it to connect any set of home speakers to your computer. PowerWave makes a great compact amp for your MP3 player. It even enables the use of Apple Pro Speakers™ with any USB enabled computer. Flexible input, exceptional output and amplifier power in one beautiful device—PowerWave.



PowerWave \$99
USB Audio Interface & Amplifier

\$39⁹⁹



iCurve
PowerBook & iBook Stand

- Raises laptop screen to the perfect height
- Creates room on the desktop for an external keyboard and mouse
- Keeps laptop cool with max air circulation

\$35



iTrip
FM Transmitter for iPod

- Play your iPod's music through any empty FM radio station from 87.9 to 107.9
- iPod powered - no battery necessary
- Fits snug to top of iPod - no messy cables

\$45



PowerMate
USB MultiMedia Controller Knob

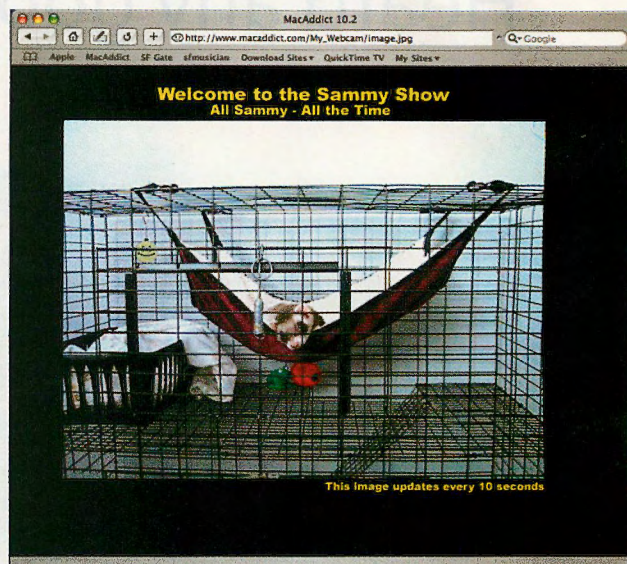
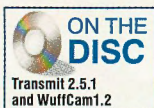
- Now in Brushed Aluminum and Black
- Great control for iTunes or iMovie
- Programmable for any application
- Replaces repetitive keystrokes

iChat or I-Spy with a Webcam

by Chris Barylick

Before some of you first drooled over the Jetsons' way-cool Visaphone, chowing down on Cap'n Crunch in your pjs, videoconferencing was the goal for future communication. Videoconferencing devices have gotten a lot smaller and less expensive since AT&T's first Picturephone back in 1956. With Apple's iChat AV software, they've become a whole lot easier to use as well.

With a FireWire video camera, iChat AV allows users to contact each other over a 56-Kbps modem (voice only) or videoconference (audio and video) over a broadband connection. But you can also use your camera to upload video images to your Web site if you're an exhibitionist or simply want to spy on pets (or kids) left home alone. Whether you want to live your Jetsons dream or just avoid ponying up extra cash for long distance service, we show you how to videoconference with a buddy over iChat AV.



Got a DV camera or Webcam? Take a peep at friendly faces from far, far away—with or without their knowledge.

And if spying is more your MO, we show you how to use your video camera to send a videofeed to your own Web site, which you can view from anywhere in the world.

Set Up a Videoconference



WHAT YOU NEED

- iChat AV (\$29.95 or free with Panther, www.apple.com)
- FireWire video camera, such as the iSight (\$149, www.apple.com) or iBot (\$99, www.orangemicro.com), or any DV camera
- Microphone, internal or external (if one isn't built into your video cam)

1 Optimize the Situation First make sure your shooting location is well lit, and place any Mac-connected speakers away from the microphone to prevent echo. Attach your video camera to your Mac, point it at yourself, and launch iChat AV. In the Buddy List window, click the camera icon next to your name to open the AV chat window, and start talking to yourself. If you're not hearing sound, click Preferences, click the Video icon, and select your mic or video camera from the Microphone pop-up menu. If the



video appears dark, shed more light in the area. If the volume is too high or low, select System Preferences from the Apple menu, click Sound, click the Input tab, and adjust the Input Volume slider.

Whether you use your Webcam to chat or spy, be sure to gauge audio and video quality first.

2 Contact a Buddy To add someone to your Buddy List, select Add A Buddy from the Buddies menu, click either Select Buddy (to add someone from your Address Book) or New Person, select .Mac or AIM from the Account Type pop-up, type the person's user name in the Account Name field, and click Add. Then contact your friend by clicking the camera icon next to his or her name; iChat AV sends a videoconference invitation to your friend. Once he or she accepts, iChat AV sorts out the connection, your friend's face pops up in a window, and the gabfest begins.

Enter the buddy's AIM screen name: account:

Account Type: .Mac

Account Name: @mac.com

Address Book Information (optional):

Buddy Icon:

First Name: Max

Last Name:

Email: max@macaddict.com

Add .Mac and AIM users to your Buddy List, and a camera icon will appear beside each name if the person is available to video chat.

Set Up a Spy Cam

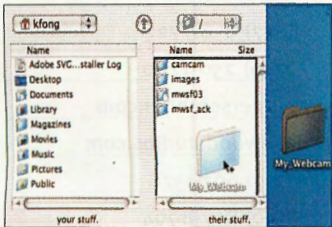


WHAT YOU NEED

- Webcam (USB or FireWire)
- Your own Web site
- FTP client, such as Transmit (\$24.95, www.panic.com)
- Broadband connection
- WuffCam (\$20, www.wuffwuffware.com) or comparable Webcam software

1 Create a Webcam Directory

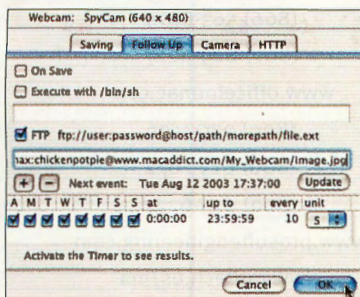
It takes two people to chat, but only one to rig up a spy cam that sends a videofeed to a Web site. Because cable and DSL upload speeds are much slower than download rates, don't expect full-motion video. Instead, set your Webcam software to upload an image every 10 to 15 seconds to avoid bottlenecks. To house the pending video feed, create a new folder on your desktop, give it an appropriate name, and upload it to your Web site's main directory (or anywhere else). Then attach your camera to your Mac, turn it on, launch WuffCam, and click the Webcam icon to see your camera's view in the window.



We uploaded our My_Webcam directory to our site's main directory by simply dragging and dropping the folder using our FTP client, Transmit.

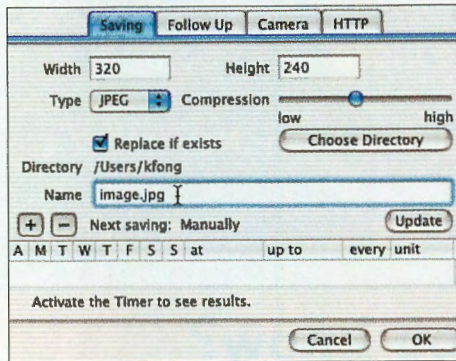
3 Integrate Intervals and Serve It Up

Below your FTP settings, set how often you'd like your camera to upload an image. Don't strive for too many images per minute, or you'll choke your connection. Start off with every 15 seconds and then adjust from there if warranted. Click the plus (+) sign to add an interval; a series of checked boxes appear that correspond to each day of the week. If you don't want a particular day included in your feed, uncheck the box for that day. From the Unit pop-up, select Seconds, double-click the time interval under Every, and type an interval (we set ours to update every 10 seconds). Then click OK, click the No Timer Active disclosure triangle at the bottom of the window to view the progress, and click the Timer icon to activate the feed.



Because our site isn't set up to do streaming, we set WuffCam to upload a videofeed image every 10 seconds.

2 Seed the Feed Click the Settings icon, click the Camera tab, and enter your camera's resolution in the Width and Height fields to prevent your feed from appearing cropped (we typed 640 in Width and 480 in Height for our Sony DV camera). Then click the Saving tab and type 320 in the Width field and 240 in the Height field. Select JPEG from the Type pop-up menu and type *image.jpg* in the Name field. Then click the Follow Up tab and check the FTP box. In the field beneath it, type *ftp://*, then type your user name, a colon, your password, an @ sign, your site's URL, the path to your Webcam directory with each directory separated by a slash (/), and then *image.jpg*—it should look something like this: *ftp://max:chickenpotpie@www.macaddict.com/My_Webcam/image.jpg*.




For simplicity's sake, we named our videofeed file *image.jpg*, but you can name yours something else if this really repels you.

4 Check It Out To view your feed, launch your Web browser, and type the URL of your Webcam file (we typed *www.macaddict.com/My_Webcam/image.jpg*). You should see yourself (or whatever happens to be in front of your camera) on the page. If you don't see anything, use your FTP client to take a peek inside of your Webcam directory for an *image.jpg* file. If the upload image isn't there, check the FTP you entered in step 2 and try again. Once you've got the feed going, send out the URL to others who'd enjoy your exhibition.



To spy on our little rugrat at home, we typed our Webcam URL at the office. Sammy's going potty in the box. Good Sammy.

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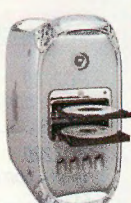
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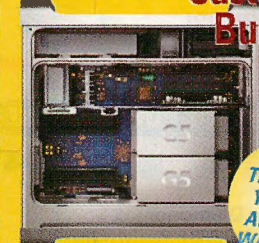
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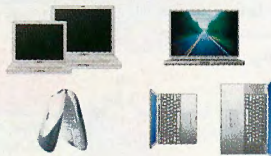
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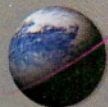


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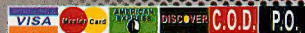




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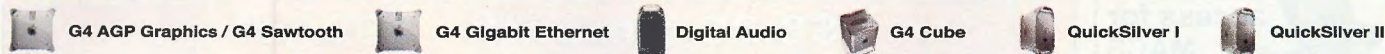
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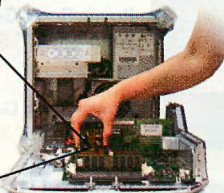
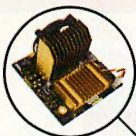
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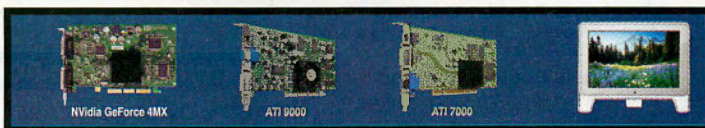


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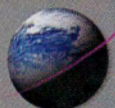
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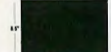
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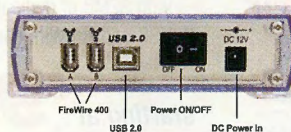


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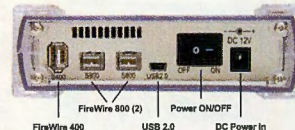


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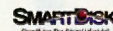
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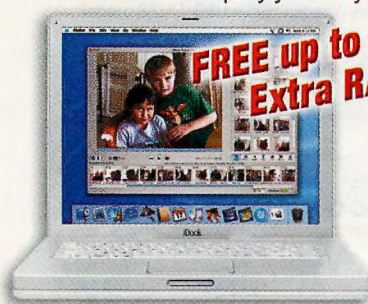
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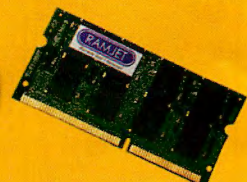
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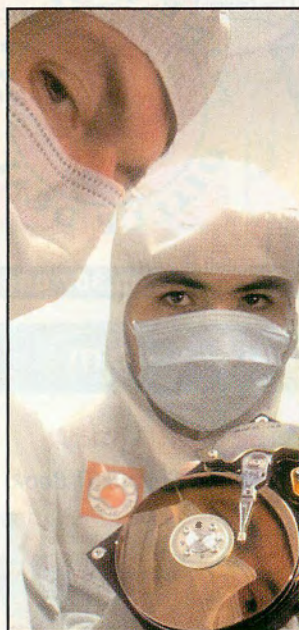
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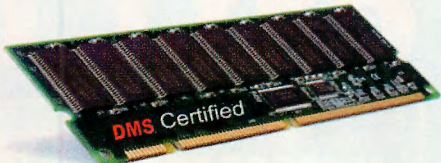
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LETTERS

AH, THE LOVE

I was having a problem sending email, so I called my ISP's tech-support line. I was surprised when customer-service rep Denzil told me he was a Mac addict. Then my cordless phone went dead. "I'll have to spend another 20 minutes on the phone and I'll never get another Apple polisher," I thought. Then my phone rang, and it was Denzil. "If you'd been a PC user, I wouldn't have called you back," he said.

—Perry Bekkerus



All that's missing are the Barry White tunes.

THAT '70S BOOK

My ShagBook is a fully functional 400MHz Pismo PowerBook. Even the Apple on the lid is animal print. Note that the keyboard has no letters or numbers on it—I took them off so people would find it hard to type, and leave my Mac alone.

—Joel Broveleit

Joel says he crafted his ShagBook with fake fur from a hobby store (affixed with 3M Super 77 spray adhesive), noting "Be careful, because once it's on, it's on." For the body, he used bronze paint and several layers of clear coat.—Max

MORRIS NEEDS AN X

My hard drive is partitioned for Mac OS 9 so that my wife can play Scrabble. I have been searching for a Mac OS X version of the game in vain. If I could get one, I could eliminate OS 9 altogether.

—Morris Rapoport

Sorry, Morris. While MacSoft, publisher of Scrabble, says it's looking into the possibility of making a Mac OS X version, it's going to require some contract work with Atari and Hasbro. Check out Freeverse Software's X-Words Deluxe (\$19.95, www.freeverse.com) while you're waiting.—Max

MARY TYLER, MORE!

Hire Mary E. Tyler! She's made me an even more advanced Mac user. Her story, "Run Unix Apps in Mac OS X" (May/03, p64), was priceless. I know my way



RECENTLY SIGHTED

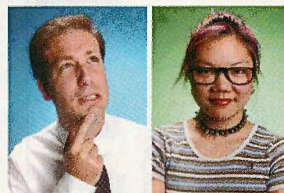
To show my support for Apple, I have dedicated my own skin for the rest of my life to advertising.
—Jeremy Carrus

around OS X fairly decently, but Mary opened up a whole new world for me.

—Damon Williams

AOL HELL

I just read your Internet Service Deathmatch ("ISPs Put to the Test," Aug/03, p30). Finally, some intelligent people speak out about how lame and retarded AOL is.



Our testers panned AOL, but not its support for multiple users.

Now that there are so many more choices for Mac fans, I am glad to see people are realizing how much better other services are.—Mike Elza
In the name of fairness, we should point out that both our testers—First-Time Fred and Nerdy Nelly—gave AOL and A for allowing up to seven user accounts.—Max

ALL'S WELL THAT ENDS WELL

Chris Imlay is my hero. Not only did he capture the

essence of Shakespeare in his staff rant (*Staff Rants*, Sep/03, p12), but he also played on one of the most distinctive features of Shakespeare's play, *A Winter's Tale*. Bravo.

—Will

Had we known that Chris's puckish reference to Willy the Shake's famous stage direction, "exit, pursued by a bear" would inspire such a tempest of email, we would've knocked him on his Macduff.—Max

MORE SQUASHING

I just used my "50 Toughest Bugs Squashed" *MacAddict* issue (Aug/03) to squash a hornet that landed on my monitor. Make that 51 bugs squashed!
—Muggsy Lauer



PRAISE FROM DBUG MASTER

I highly recommend *MacAddict*'s "50 Biggest Mac Bugs and How to Kill 'Em" article (Aug/03, p16). It answers many of the Mac OS X, Microsoft Office, and email questions that have come up at Seattle Macintosh User Group (www.dbug.org)

SABOTAGED

SURVEY SAYS

Online Poll Results

We're dismayed to report that our July online music poll (asking you if the iTunes Music Store has increased, decreased, or not affected your desire to illegally download free music) was sabotaged by a hacker, a wacko, the RIAA (OK, that's totally unsubstantiated), or possibly ourselves. Look online for a new, fortified poll.

WRITE TO US!

MacAddict, 150 North Hill Dr.,
Brisbane, CA 94005
or letters@macaddict.com

FOR CD PROBLEMS:
go to www.futurenetworkusa.com

FOR SUBSCRIPTION QUERIES:
call (toll-free) 888-771-6222

LOG OUT  95

meetings and forums.
—John Livingston, office
applications SIG leader

THE OTHER VELOCITY ENGINE

Imagine my surprise when I popped the August 2003 Disc into my Power Mac G4 and was blown away. I found myself completely enthralled with the band Velocity Engine, whose music was featured on the Disc. Cheers to MacAddict for helping me discover a brilliant new band that loves Macs almost as much as I do!

—Kristian Grovenet



A band named after the G4's vector processing unit just has to be good.

WHO LIKES FU MANCHU?

I was re-reading your May 2003 issue today and noticed that in the iLife review (*Reviews*, May/03, p46), the iMovie screenshot lists a song by my favorite band, Fu Manchu. Who on your staff likes this band. Is it Max?—Gary Schnettler

Nope, it's Niko, who says that any band that covers the Blue Oyster Cult song "Godzilla" is OK by him.—Max

DO NOT DO THIS AT HOME

In *Unix University* (Aug/03, p59), you say the most dangerous command in Unix is `rm -R *`, which deletes your Home directory. I disagree. The most dangerous command is `rm -R /`, which deletes every file on your machine.—Ben

HOMAGE TO SELF-COMBUST

I thoroughly enjoyed Self-Combust (*Letters*, Sep/03, p95), David Hanauer's app that earned an honorary zero-widget rating by bursting into flames. I have made my desktop and Dock honor its insane chaos.—Carl



Here's to spontaneous combustion!

HE'S GOT A POINT

I must protest your answer of *b*, Jennifer Morgan, on Quiz question number 52: "Which MacAddict staffer would be least likely to crash Steve Jobs's Gulfstream V?" ("The Ultimate MacAddict Quiz," Sep/03, p32). I don't care if Jennifer Morgan is a licensed pilot—accidents happen. I say Max is the correct answer. Being nonexistent, he couldn't fly the plane to begin with, and thus stands a zero-percent chance of crashing it! Now gimme my point!—Thomas

THE TRUTH BEHIND KELSEY KANDEL

That's not middle-school saxophonist Kelsey Kandel in "The Ones Apple Left Behind," (*Shut Down*, Sep/03, p96). It's Chris Slate from *PSM* magazine. You can't fool us.—G

OK, OK, when Chris Slate isn't down the hall working as the editor in chief of *PSM* magazine, he moonlights as fictitious sax-man Kelsey Kandel. But don't blame Chris—we made him do it.—Max

MacAddict
CONTEST

WIN A 250GB ONETOUCH DRIVE FROM MAXTOR

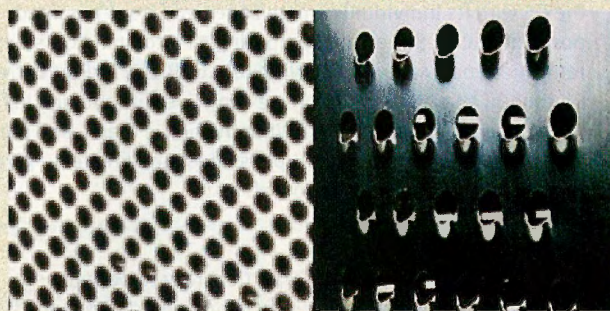
Win a 250GB OneTouch Drive from Maxtor (\$349.99, www.maxtor.com), a 7,200-rpm FireWire drive with built-in OneTouch backup using Dantz's Retrospect Express. To win, just write the best caption for the picture below and send it in. Only one entry per contestant.



Win a 250GB OneTouch drive with built-in backup system.

PHOTOGRAPH BY MARK MADEO

ENTRY FORM



CONTESTANT INFORMATION

Full Name: _____
Address: _____
City: _____ State: _____
Zip: _____
Email or telephone: _____

Send snail-mail entries to: Maxtor Contest
MacAddict magazine, 150 North Hill Dr., Brisbane, CA 94005
Send email entries to: contest@macaddict.com. Subject: Maxtor Contest
Deadline for entry: November 30, 2003.
Contest results will appear in our Mar/04 issue.

Contest Rules

The judges will be MacAddict editors and will base their decision on 33 percent humor, 33 percent originality, and 33 percent creativity. All entries must be received no later than November 30, 2003, with the winner announced around March 2004. By entering this contest, you agree that Future Network USA may use your name, likeness, and Web site for promotional purposes without further payment. All prizes will be awarded and no minimum number of entries is required. Prizes won by minors will be awarded to their parents or legal guardians. Future Network USA is not responsible for damages or expenses the winners might incur as a result of this contest or the receipt of a prize, and winners are responsible for income taxes based on the value of the prize received. A list of winners may also be obtained by sending a stamped, self-addressed envelope to Future Network USA c/o MacAddict Contest, 150 North Hill Dr., Brisbane, CA 94005. This contest is limited to residents of the United States. No purchase necessary, void in Arizona, Maryland, Vermont, Puerto Rico, and where prohibited by law.

CONTEST

WINNER!

Congratulations to Boris Starosta, whose caption for this picture won him a 3.2-megapixel Olympus Stylus 300 digital camera (\$399, www.olympus.com).



WYSIWYG vs. WTF.

HOW NOT TO

Upgrade Your Mac



WHAT YOU NEED

- Power Mac with an available slot—any slot
- SuperFast Computing's Plutonium Xcess upgrade card or equivalent—the bigger, faster, and more excessive, the better
- Insparkerator 2000 Superwooly wool socks (or equivalent) or a Tesla coil
- Arc welder
- Assorted power tools—hammers, crowbars, belt sanders, vacuum cleaners, and the like

The solution to G5 envy (aside from racking up the credit card debt) is a no-brainer: Upgrade. A massive, gratuitous, *Maximum PC*-style upgrade will help you forget all about the G5 with its individual climate zones and front-mounted ports. Installing SuperFast Computing's Plutonium Xcess Card refortifies your Mac with FireWire 800, USB 2.0, AirPort Extreme, Bluetooth, and other fast stuff we can't live without (and in fact haven't heard of: PGX9993q? What the hell is that?), and puts your humble G4 on par with Apple's latest and greatest—give or take. Grab your tools and follow along.

1 Prime the Pump Contrary to popular wisdom, static electricity is our friend. On the low-power systems of old, it's true that you had to keep extraneous emissions to a minimum, and some paranoiacs went so far as to practice voodoo with a traditional antistatic wrist strap. Wussies.

But today's modern Mac thrives on power. Before installing the Plutonium Excess card, prime it liberally with electrostatic current (we used a friction-generated variety, but a Tesla coil will work in a pinch). We employed Ronco's Insparkerator 2000 Superwooly electromagnetic socks for optimal performance: Simply pull the socks onto your feet, grasp the Plutonium Excess card firmly in both hands, and shuffle vigorously across a carpeted floor.

It's like wearing a mini power plant on each foot.



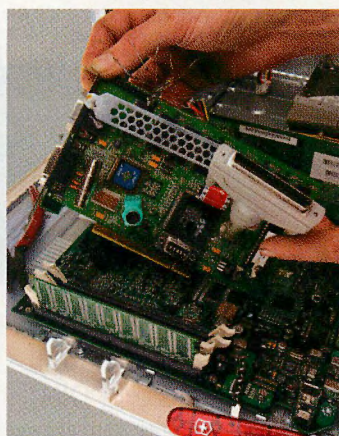
More shuffling means more juice, so take an extra lap around the office.

Electrostatic discharge is a sure sign that the card is ready for installation.



2 Stuff the Slot When you build up enough of a charge to throw bolts, or at least make your scalp tingle, open your Mac's easy-access side door. If you need to, hold the card in your mouth; doing so will free up your hands.

Locate an open slot, ideally one that looks like a good match



for your card. Some cards require a little massaging to seat properly, but we've never met a card we couldn't fit into a Power Mac. As they say in the Midwest, if it won't fit, force it.

Like parking an SUV in a space marked Compact Only, installing some cards requires a little finesse.

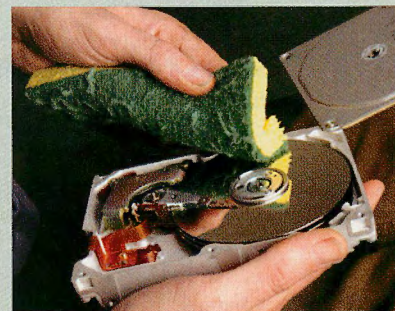
3 Batten Down the Hatches With any powerful upgrade comes powerful heat, but it's nothing a Power Mac's cooling system can't take. Just make sure your card can handle the Mac's cooling system, especially if you have a Mirrored Drive Door (aka Windtunnel) model. For optimal integrity, we used an arc welder to fuse the card right to the motherboard.

With the card firmly seated, fire up your arc welder. Observing proper safety precautions (always), don your helmet or goggles, and go at it. Remember, more is better, so don't be stingy with the rebar if you need it!

Close up your Mac, fire it up, and get ready to run faster, jump higher, and play solitaire better than ever!

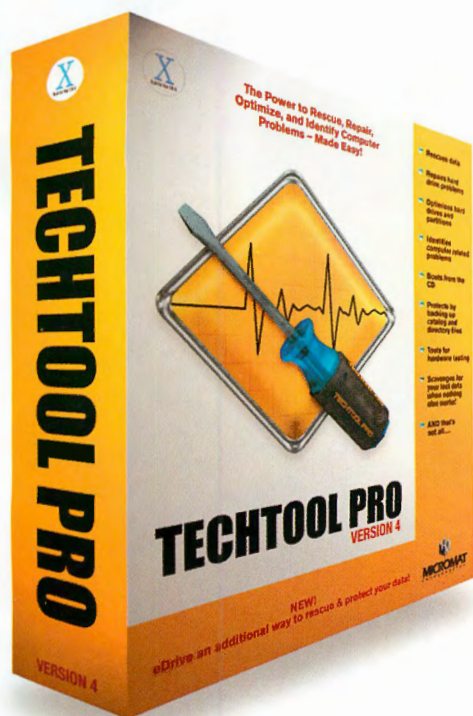
MEAN, CLEAN MACHINE

If you're not ready to perform major surgery on your Mac, don't stress out—you can gain considerable speed by simply



Scrub those platters, Cinderella!

performing a little routine maintenance on your hard drive. A clean and properly defragmented drive is a happy drive, and a happy drive is faster drive—and as a bonus, it won't eat your data for lunch. Hopefully.



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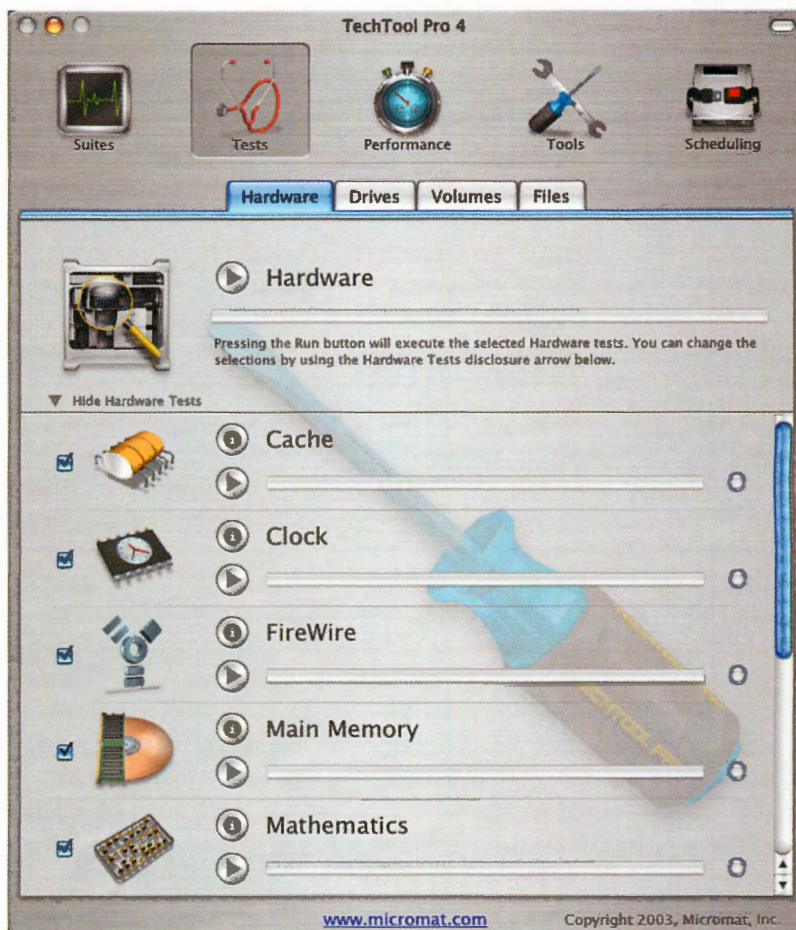
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